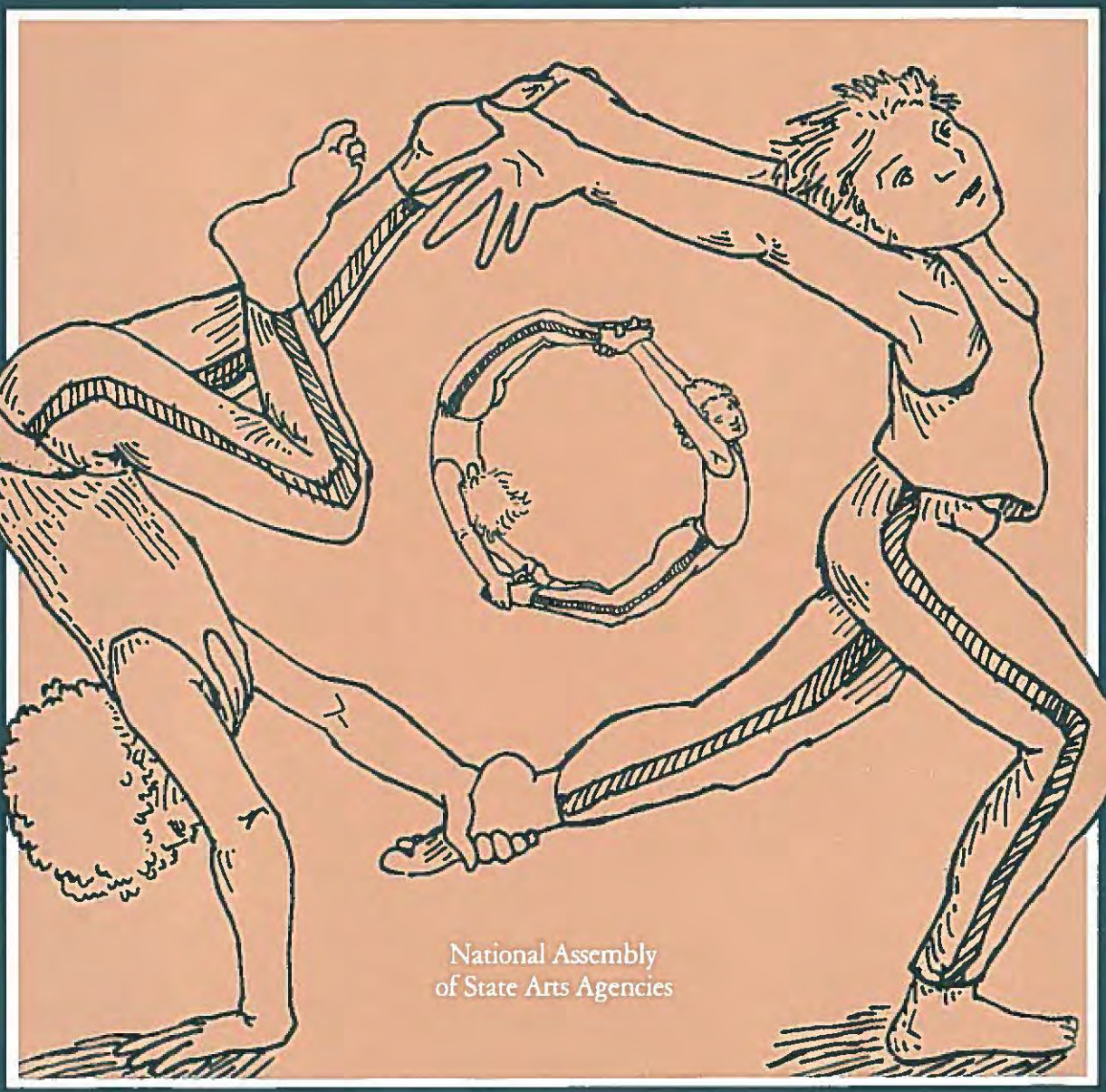
All in Order: Information Systems for the Arts

A Report of the National Information Systems Project

Including the National Standard for Arts Information Exchange



National Assembly
of State Arts Agencies

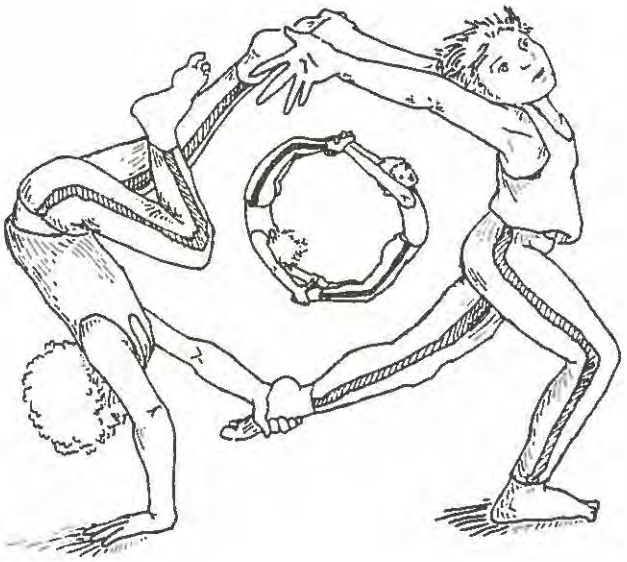
All in Order: Information Systems for the Arts

Including the National Standard for Arts Information Exchange

Mary Van Someren Cok

in collaboration with

Henry A. Bromelkamp
Ellen Thurston
Thomas Wolf



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The National Assembly of State Arts Agencies represents the collective needs, concerns, and interests of the fifty-six state and jurisdictional arts agencies in the United States. It works toward development and support of an informed and skilled membership and provides forums for the review and development of national arts policy. Its offices are located at 1010 Vermont Avenue, N.W., Suite 316, Washington, D.C. 20005, telephone (202) 347-6352.

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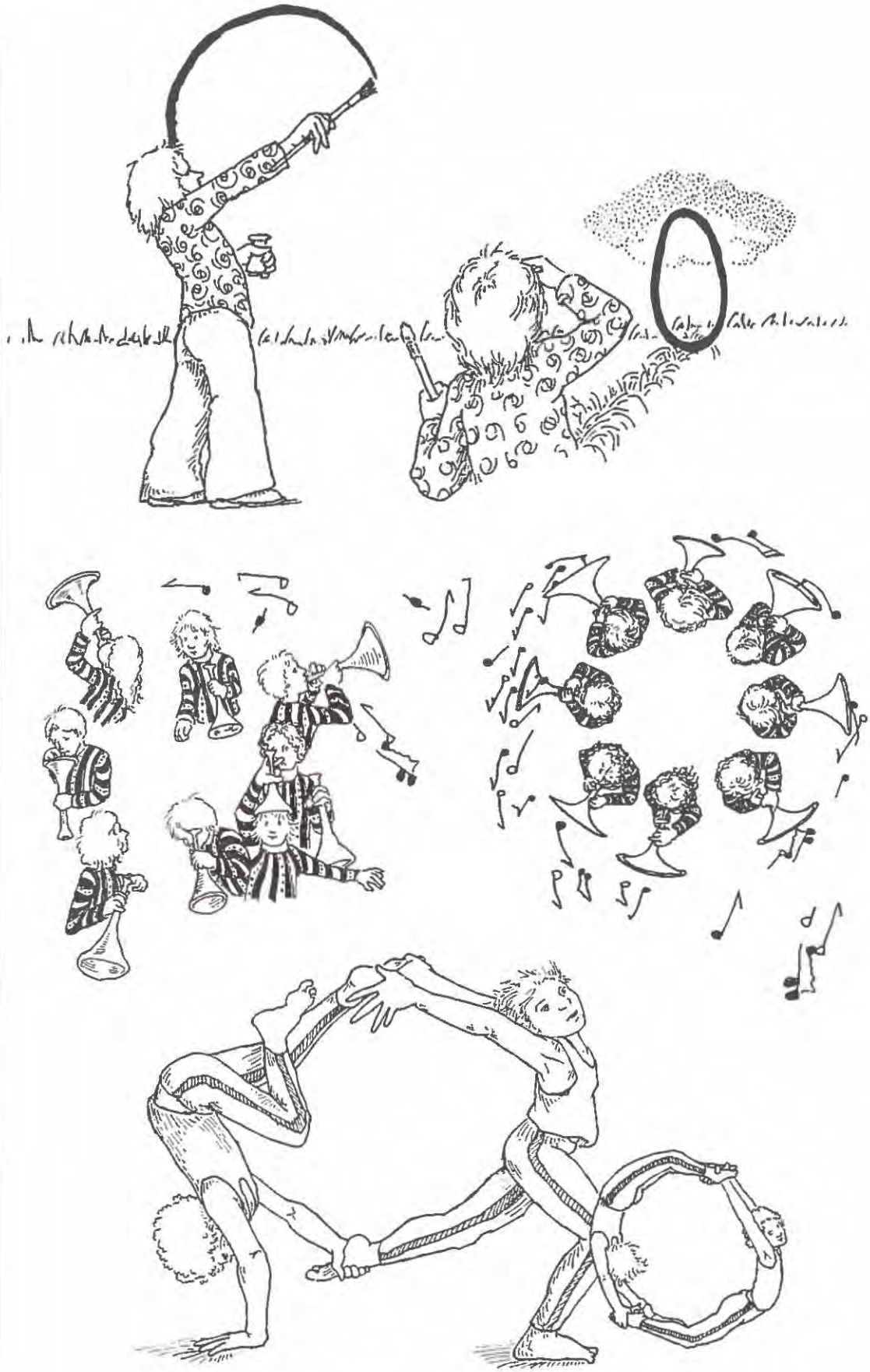
". . .in a computerized age . . . there may be a tendency to mistake data for wisdom, just as there has always been a tendency to confuse logic with values, and intelligence with insight. Unobstructed access to facts can produce unlimited good only if it is matched by the desire and ability to find out what they mean and where they would lead."

"The biggest single need in computer technology is not for improved circuitry, or enlarged capacity, or prolonged memory, or miniaturized containers but for better questions and better use of the answers."

Norman Cousins
"The Computer and the Poet"
Saturday Review
July 23, 1966



"The pursuit of the arts ought never
Suffer linguistics' short tether...

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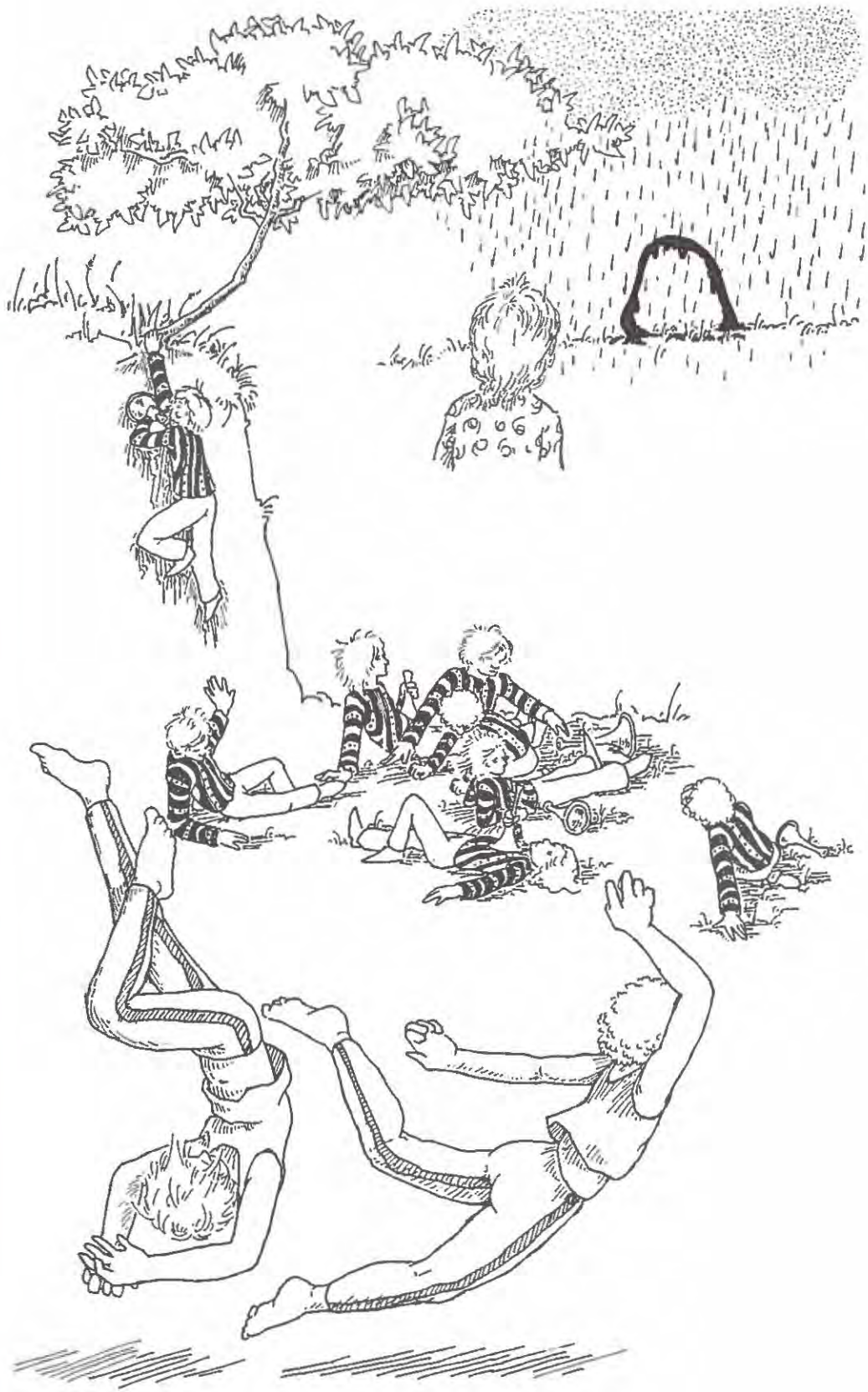


...For like chess or parades,
Like love or charades...

Preface

Successful projects grow out of chance encounters, coincidences, and good luck. The National Information Systems Project is no exception. Three and a half years ago, the directors of five regional arts agencies were in Cambridge, Massachusetts, for their quarterly meeting. It was late in the afternoon. We had met all day in a comfortable living room before a warm fire, but we were tired and ready to retire to the kitchen for a few beers and the inevitable argument about which of us had the best region. There were the usual insupportable claims about the best conductors, art museums, ballet companies, sculptors, orchestra managers, and state arts agency directors. Then someone said, "Our region has not only the best but the *only* arts computer system in the country." There were choruses of protest: "We have one too, and it's more sophisticated than yours!"

Suddenly the clamor stopped as we realized the impact of what was being said. Each of us was developing computer systems for arts management. Each of the systems was being developed independently. Each system, when developed, would be unique. We would all be collecting information in our own way and there would be no way to compare what we were collecting. We also realized that the situation *could* be very different. We could stop working independently and begin collaborating on one very powerful, national system. Our five organizations, representing thirty-six state arts agencies, could begin to compile nationally compatible arts information. The beers were carried back to the living room as we began to think about a project which might involve the development of national information systems for the arts.

The timing was almost perfect for a major national project of this type. John K. Urice, then Administrative Director of the Fine Arts Council of Florida, had developed a computer system for his agency and was eager to do additional research. He was contracted to carry out an initial inventory and analysis of the use of computers in public arts agencies, and his final report included recommendations on the future structure and methodology of a national project. Henry Putsch of the National Endowment for the Arts' Office for Partnership (then called the Federal-State Partnership Program) was concerned about the lack of reliable national information about arts agencies and was willing to recommend a grant for such a project. Others at the Arts Endowment, including Chairman Livingston Biddle and Deputy Chairman David Searles, gave their support to the project and coordinated computer development at the National Endowment for the Arts with the project's efforts. When the National Information Systems Project was finally underway, we were able to turn over the responsibility for systems development to two exceptionally gifted people, Mary Van Someren Cok, who supervised a Working Group of state and regional arts agency personnel, and Henry A. Bromelkamp, a systems consultant. It soon became apparent, however, that the project was no longer one which was merely of interest to regional organizations, and during the second year, its administration was turned over to the National Assembly of State Arts Agencies.

This book reports the accomplishments of the National Information Systems Project and especially the work of a dedicated group of people from many agencies who came together and painstakingly developed the systems reported here. First among them was Ellen Thurston, of the Center for Arts Information in New York, who provided expert coordination for the project. Members of the Working Group were:

Diane Arywitz, *Southern Arts Federation*
John Bos, *New York State Council on the Arts*
Will Conner, *Mid-America Arts Alliance*
Nash Cox, *Kentucky Arts Commission*
Linda Evans, *Western States Arts Foundation*
Jill Falk, *California Arts Council*
Frank Jacobson, *Western States Arts Foundation*
Kathy Mohr, *Affiliated State Arts Agencies of the Upper Midwest*
Lara C. Morrow, *Great Lakes Arts Alliance*
Kathleen O'Connell, *New York State Council on the Arts*
John A. Reed, *Kansas Arts Commission*
Anthony Turney, *Southern Arts Federation*

Advice and assistance were provided by:

Jeanne G. Anderson, *Office for Partnership, National Endowment for the Arts*
Ed Dickey, *Office for Partnership, National Endowment for the Arts*
Joseph Harris, *Administrative Services, National Endowment for the Arts*
Robert Olmsted, *Dance Program, National Endowment for the Arts*
Joanne Pearlstein, *Office for Partnership, National Endowment for the Arts*
Gretchen Wiest, *National Assembly of Community Arts Agencies*

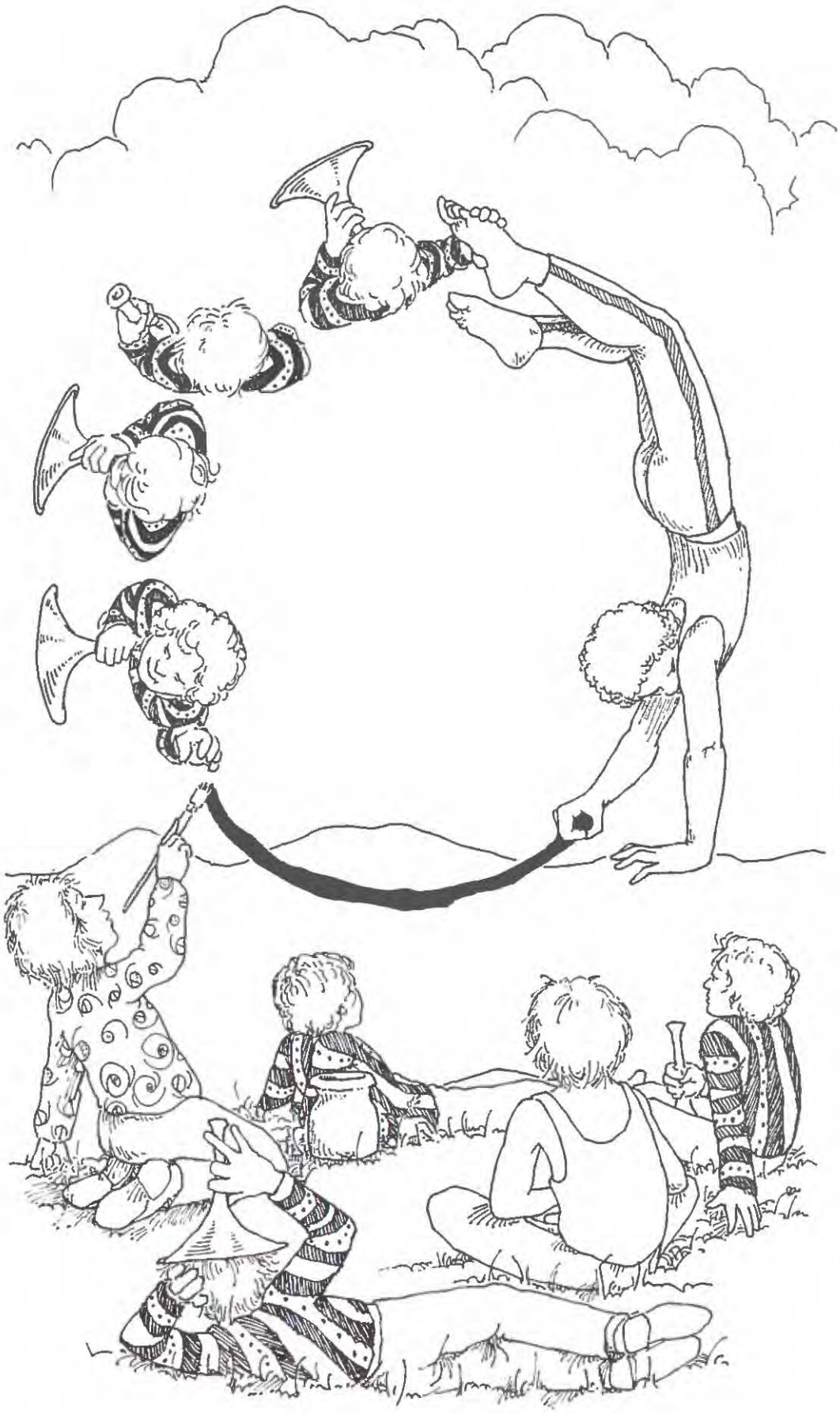
Those who served on the National Assembly of State Arts Agencies Policy Committee supervising this project were:

John G. Coe, *New Hampshire Commission on the Arts*
Nash Cox, *Kentucky Arts Commission*
Wayne Lawson, *Ohio Arts Council*
John Ondov, *Minnesota State Arts Board*
John A. Reed, *Kansas Arts Commission*
Franklin D. Schurz, Jr., *Indiana Arts Commission*
Alden C. Wilson, *Maine State Commission on the Arts and Humanities*
Gerald Yoshitomi, *Western States Arts Foundation*
Peter Hero, *Oregon Arts Commission*
Lida Rogers, *Mississippi Arts Commission*

To all of these people, the National Information Systems Project owes a great deal of thanks. We are also grateful to Roy Helms, Laura Hotchkiss, Geoffrey Platt, Jr., and Karl Stevenson, of the National Assembly of State Arts Agencies, who helped administer the project, and we acknowledge David R. Cok and the staff members at the Center for Arts Information for their contributions to this book's development and publication.

Information is power, and the systems described here provide a powerful tool to collect and organize nationally compatible information. But a tool is a means to an end, not the end itself. If these systems are put in place simply to collect information for its own sake, the National Information Systems Project will have been a failure. However, if the information is put to good use, if it assists in the internal administration of arts agencies and leads to a pool of useful knowledge about the arts in America, it will have been a success. It is our hope that the use of arts information will be as carefully planned as the development of the systems which now make its collection possible.

Thomas Wolf
Executive Director
New England Foundation for the Arts
former Project Director
National Information Systems Project
March, 1981



... Some things are done better together."

Introduction

The National Information Systems Project

Background

In the United States, arts agencies on the national, regional, state, and community levels offer similar kinds of programs and services. They give grants to artists and arts organizations, maintain events calendars and arts resource directories, publish newsletters, conduct workshops and research projects, and offer technical assistance. They also, therefore, have similar information needs related to their own internal management, to the needs of the constituents they serve, and to the increasingly complex needs of the funding sources to which they report.

They must, for example, manage the process of reviewing and funding growing numbers of grant applications and developing grant histories to provide data for program analysis and planning. They must maintain large mailing lists and inventories of artists, exhibits, facilities, and organizations, and keep their accounts in accordance with public financial management standards. And arts agencies must report to legislators, contributors, and governing boards on the funds they disburse and services they render within specific geographic regions, programs, and arts disciplines. In an effort to accomplish all of this within the ubiquitous constraints of limited money, staff, and time, arts agencies have in the past five years begun to turn to computers and other automated methods of performing routine work and satisfying information needs.

In late 1977, five regional arts agency directors, who envisioned the exchange of nationally compatible data on the arts, commissioned John K. Urice, then Administrative Director of the Fine Arts Council of Florida, to conduct a study of information systems in public arts agencies.* The intent of the Urice study was:

- to determine what information systems existed within state and regional arts agencies;
- to determine what systems were planned;
- to determine what information was needed;
- to evaluate the feasibility of nationally compatible information systems;
- to recommend how to proceed in the future.

The Urice study was not limited to those state and regional arts agencies which had already turned to automated methods of solving information needs, nor was it restricted to those areas of arts agency management which were obviously applicable to computerization. Using site visits, telephone surveys, document reviews, and personnel interviews, Urice examined systems being used for mailing, accounting, grants and records management, correspondence, research, and indexing.

*John K. Urice, *Consultant's Report re Information Management Systems for State and Regional Arts Agencies* (1978).

He found that in responding to common management problems and information needs, arts administrators had devised many systems — some effective, others plagued with difficulties; some computerized, most not — and had a high degree of interest in the continued rapid development of such systems. The existing information systems were being developed independently, however, and thus, in Urice's view, "the overall information needs of a region or the country were no closer to being met." The creation of independent systems seemed "wasteful and redundant" and did not "solve the basic need for compatible and comparable management information at a number of decision-making levels."

These findings raised an important question: should arts leaders envision a computer or series of computers collecting data about the arts field and producing comparable statistics which would be useful on a national level? Urice said no, and recommended "abandoning as too expensive and impractical the concept of a national system of interlocking computers." Rather, he advocated developing a special kind of compatibility in arts agency information systems — not that of identical machines and computer programs, but a "national system of 'working definitions'" which would insure "that information and reports developed from [arts agency] systems would allow meaningful analysis and use." Urice further recommended developing "a model data base incorporating information which [arts agencies] need consistently." Once this had been achieved, collection of arts data on a national basis would be possible.

The Urice investigation was the first step in beginning the national dialogue on information systems for public arts agencies. The second step, that of implementing Urice's recommendations, is being carried out through the National Information Systems Project (NISP).

Goals of the National Information Systems Project

The National Information Systems Project is a four-year, federally funded program to establish a national standard for information systems in public arts agencies. Begun in September, 1978, the project was administered for one year by the New England Foundation for the Arts before being turned over to the National Assembly of State Arts Agencies (NASAA) in 1979. These are the goals of the National Information Systems Project:

I. To arrive at national compatibility in both the organization and labeling of information used by public arts agencies through:
   A. standardizing terms and definitions (e.g., similar labels for similar pieces of information);
   B. standardizing methods of collecting, organizing, and disseminating information (e.g., forms, reports, and other documents).

II. To develop standard systems for:
   A. mailing lists — with the capability of selecting particular constituents for specific types of mail;
   B. grants management — with the capability of tracking the grant-making process and permitting analysis of grant programs by fiscal year, arts discipline, political or geographic area, organization, budget size, etc.;
   C. arts resource directories — with the capability of providing detailed information on artists and arts organizations, performance and exhibition spaces, arts festivals, and presentors of arts events.

III. To make possible the exchange and analysis of comparable arts data on a national basis by:
   A. assisting state and regional arts agencies in implementing the standard systems with
      1. small grants for consultants, training, staff, and equipment or computer programs;
      2. educational workshops, publications, and technical assistance;
   B. beginning dialogue among public arts agencies on future maintenance of and adherence to the standard systems, and on responsible use of the information which will be available.

Since there are many information needs within arts agencies, the task of selecting those to be addressed by NISP was a difficult one. The project investigated a variety of information systems before choosing those which it felt offered the best opportunity to serve the unique needs of individual agencies while simultaneously serving the need for arts information on a national scale. Mailing list, grants management, and arts resource directory systems were chosen because they were common to most agencies, and therefore provided occasion for crucial management improvement in many places. They also offered the greatest opportunity for national standardization, and could provide the kinds of information needed for national analysis of publicly funded arts agencies.

The National Information Systems Project recognized, however, the value of coordinated system planning for those agencies which would have the desire and resources to go beyond development of the three standard systems. For this reason, NISP systems were designed around a core list of arts agency constituents — a list which could serve as the basis for development of additional information systems. Furthermore, the standard systems include some items of information offered on an optional basis, which, if maintained and augmented with other data, could provide a foundation for research on program evaluation, economic impact of the arts, per capita distribution of funds and services, constituent profiles, and so forth. Finally, wherever appropriate, the NISP systems contain references to points where they could logically intersect with information systems not developed by the project.

Structure

The National Information Systems Project is directed by a Board-appointed Policy Committee of the National Assembly of State Arts Agencies. This group of state and regional arts agency chairmen and staff members provides programmatic direction and considers policy questions arising in the course of project activities.

Actual development of the three NISP systems was accomplished during the project's first eighteen months by a Working Group of representatives from each regional and several state arts agencies. These representatives worked with staff members from the National Endowment for the Arts, arts service organizations, and a large network of local contact people in their regions and agencies. A project coordinator was charged with developing communication between NISP and arts agencies not otherwise in direct contact with the project and providing regular progress reports to the field. An independent systems consultant provided technical advice during all stages of project development. With the exception of the coordinator and consultant, all of the people involved in planning and executing NISP during its first two years were full-time arts administrators whose employers contributed their time and expertise to the project.

Methodology

During NISP's first year (1978-79), the Working Group concentrated on the first two project goals: 1) arriving at national compatibility in the organization and labeling of information, and 2) developing the three standard systems. Methodology centered on creation of the National Standard for Arts Information Exchange — a set of terms, definitions, and reporting requirements to be adopted by state, regional, and national arts agencies in their information systems. The National Standard is composed of system specifications for mailing lists, grants management, and eight arts resource directories.

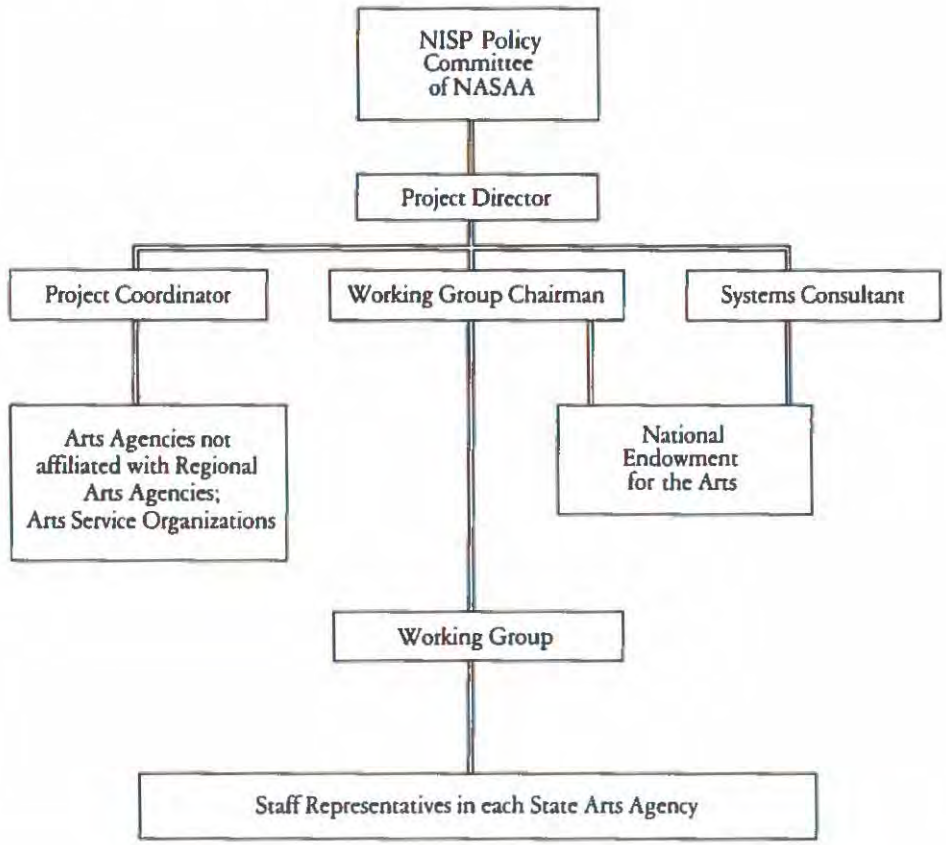
The Working Group developed each system in four steps. First, it researched similar systems currently in use; second, it developed working drafts of proposed system specifications for review and comment; third, it modified these drafts to incorporate corrections and improvements suggested by colleagues and advisers; and fourth, it released all three systems as the National Standard for Arts Information Exchange.

The first step required gathering all documents used by state, regional, and national arts agencies for mailing, processing grant applications, and obtaining resource data. The resulting collection of logsheets, questionnaires, printed reports, guidelines, application forms, directories, mailing codes, and data cards provided a primary source of the terms and definitions later incorporated into system drafts. In addition, each agency completed questionnaires to help the Working Group inventory the scale and sophistication of existing systems as well as projected program growth and information needs.

The Working Group then developed drafts of terms and definitions for common items of information, adding to each system those additional pieces of information which would be needed for national analysis of publicly funded arts agencies. These drafts also included specifications for selecting information from a system and compiling it in useful reports.

Structure of the National Information Systems Project

October, 1978 — September, 1980



When the Working Group had achieved a consensus on what each system should include, it circulated the drafts to all state and regional arts agencies, the National Endowment for the Arts, and arts service organizations, and published them in the *NASAA Newsletter*. Comments, questions, and suggestions for revision were relayed to the Working Group from all parts of the field and addressed by it at subsequent meetings. New system drafts were developed and again distributed for review and comment. This step was repeated several times for each system under consideration.

At last, when it appeared that issues had been addressed adequately, the Working Group released the three finished systems comprising the National Standard for Arts Information Exchange in a *Preliminary Report* dated January 1, 1980, and in subsequent reports on Febtuary 1 and May 16, 1980. All components of the National Standard systems are published together for the first time on pages 105-167.

As the Working Group was completing development of the Mailing List, Grants Management, and Arts Resource Directory Systems in late 1979, the second year of NISP (1979-80) saw a shift to the project's third goal — making possible the national exchange and analysis of comparable arts data. For this to be accomplished, the NISP systems had to be put into use by the arts agencies for which they were designed. Furthermore, arts administrators in those agencies had to begin learning about the implications of introducing new and possibly more complex methods of meeting their information requirements.

Systems implementation began with the availability of small block grants from the project to state and regional arts agencies adopting some or all of the NISP systems. Nearly every eligible agency applied for and received a block grant for developing systems in compliance with the National Standard. Grants were used to purchase or operate equipment, hire consultants, train staff people, update files, and prepare data for conversion to new systems.

To encourage the exchange of resources and advice among agencies implementing the National Standard, NISP compiled an index of summary information on both the manual and automated information systems existing in or proposed for each state and regional arts agency. Maintained by the project's systems consultant, the index is intended to help arts administrators learn what is being planned and developed or what has been accomplished successfully elsewhere. It will be updated as arts agencies change their information systems.

Additional NISP efforts included a series of meetings at the National Endowment for the Arts to work on Endowment systems and report documents, as well as regional workshops and training sessions for arts agency staff members.

Accomplishments

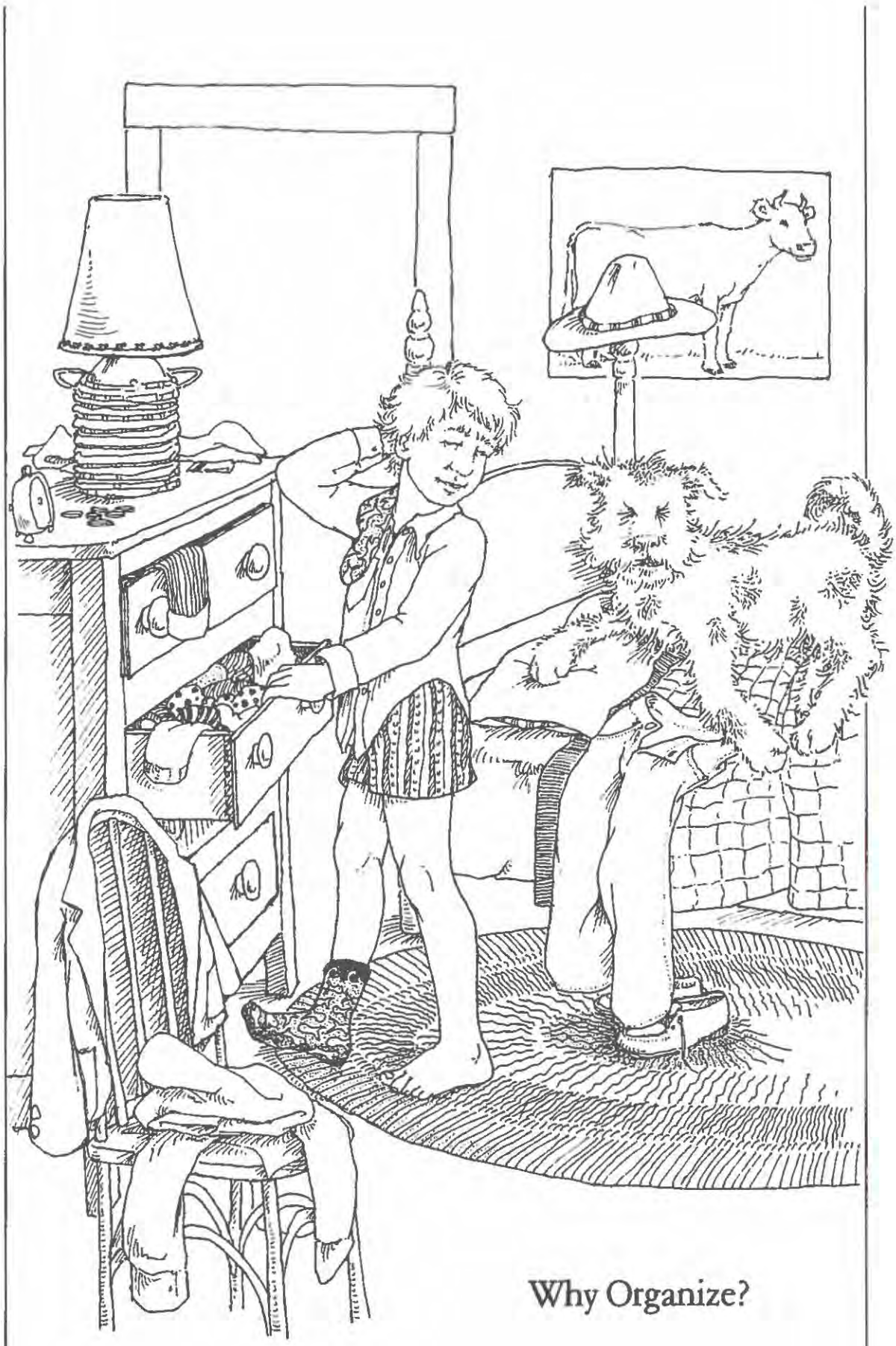
The National Information Systems Project has established a national terminology for information management in public arts agencies and has laid the groundwork for meaningful studies of public arts funding in the United States. It has accomplished part of the systems design work that needs to be completed in developing any mailing, grants management, or directory system, and through its block grants, most state and regional arts agencies are able to begin working toward national compatibility in organizing and reporting basic management data. It has begun to train scores of arts agency staff people throughout the country to assist them in better information management and has precipitated dialogue at a national level about future federal arts information requirements.

The Future

While NISP will continue to offer financial and technical assistance to agencies implementing the National Standard and will increase its efforts to foster the sharing of information management skills and resources in the future, emphasis will be placed on planning for the time when all state, regional, and national arts agencies are able to provide comparable data about their programs and constituents. In preparation for that day, the National Information Systems Project is committed to developing and supporting policies which will guide future maintenance of and adherence to the National Standard for Arts Information Exchange, and to continuing dialogue among arts agencies on the responsible use of the information which will be available.

Mary Van Someren Cok
Project Director
National Information Systems Project

Part I



Why Organize?

Chapter I

What Are Information Systems?

Most of us have a natural bent toward organization. It is what compels us to keep our socks in one drawer and our underwear in another. Without systems for organizing our possessions – two drawers and the decision to keep underwear in the one on the top and socks in the one on the bottom – we would spend most of our time looking for things.

The need for systems is even more critical when we consider information – the facts and figures we need to conduct our personal and business affairs. While our possessions may be distinctive objects which we can find by rummaging through a drawer or searching a shelf, information is often a word, number, address, or date hidden elusively in a bulging file cabinet. Fortunately, and often without our being aware of it, our lives are made simpler by systems which organize information. The recipe file which separates soups from salads, the telephone directory which divides the Johnson's from the Johnston's, and the airline reservation computer which avoids assigning two passengers to seat 12C are examples of information systems which most of us take for granted. We would all concede the value of our employer's payroll system, but how often do we think of our bills – which tell us whom we owe and why – or the bank statement which arrives in the mailbox each month, as the products of helpful systems? Yet each of these illustrates information organized in a manner necessary and useful for us to simplify our activities and meet our obligations. For we all need information – we create it, we exchange it, we receive and manipulate it, or are frustrated when it is not available – and without systems to organize that information, our lives would be chaotic.

What is a System?

Because of the frequency with which we use the word "system" and the many contexts in which the term arises, we will do well to take a closer look at what a "system" is. We talk about computer systems, manual systems, standard systems, information systems. People and organizations have systems, make systems, use systems. And systems themselves are said to do things like accounting, mailing, research, scheduling, billing, and so forth. What, then, is a "system"?

A helpful way to approach this topic is by considering four ways of defining "system"; each is useful in our attempt to understand systems as methods for organizing the information we use to manage arts agencies.

First, the word "system" is frequently used to describe *a set or arrangement of things* so related or connected to perform a specific function that they are considered a single unit. A system to light a fire, for example, might include two sticks, some bark, a pile of logs, and a skilled woodsman who can make the raw materials ignite. A boy scout's more advanced system would substitute a spark-producing piece of flint for the two sticks and add kerosene to the bark. A home owner might utilize matches, newspaper for kindling, and a bellows to produce a fire in his fireplace. And the ultimate refinement is that of the suave executive who leans back in his chair, puts his feet up on the desk, and flicks the top of his gold cigarette lighter. Each of these systems, of course, has its own advantages and drawbacks. The first requires the least equipment and the simplest supplies; the last requires the least skill. Each may be appropriate at certain times and in certain places.

Similarly, let us look at two typical payroll systems. The first includes the following "set or arrangement of things": a calculator which is used to determine the amount of pay, a typewriter to type the paycheck, a file drawer to store records, and a payroll clerk to perform these activities in a timely and accurate manner. A more sophisticated payroll system could include a keyboard and screen used to record and look at payroll information, a computer which performs calculations and stores records, and a printer which automatically prints the paycheck. The former example is often called a "manual system," because although the payroll clerk uses a mechanical typewriter and an electronic calculator, he performs most functions "by hand." The latter example illustrates a "computer system." In each case, the system is defined in terms of a unified collection of people and equipment.

Second, the word "system" is used to describe *a set of rules, instructions, or techniques* for performing a specific function. In this sense, the payroll system could be a notebook or procedures manual which specifies when payroll checks are written and for whom, how the payroll clerk determines each employee's rate of pay, how he records each transaction, where he files the records, who signs the completed checks, and in what order each step must be performed. It could also be a sequence of detailed instructions to a computer, written in a manner which the computer can interpret, which explain where to obtain payroll information, what calculations to perform with it, and where to put the results. Whether a booklet, as in the first example, or a computer "program," as in the second, the system is here defined in terms of sequential procedures and accompanying rules.

Third, "system" can be defined as *a classification plan or method of grouping and defining information* used to perform a specific function. For example, a payroll system would include a group of records, each containing data on one employee (e.g., Employee Number, Employee Name, Employee Address, Marital Status, Number of Dependents); that employee's job (e.g., Title, Classification Number, Rate of Pay); and information needed to calculate his payroll (e.g., Hours Worked, Federal Tax Withheld, State Tax Withheld, FICA Tax Withheld). Such a system would define carefully each information item (e.g., Employee Number is the same as Social Security Number; Marital Status is "Single," "Married," or "Married but withholding at higher rate"), and describe any special restrictions which apply (e.g., Employee Name may not exceed thirty characters, including punctuation and spaces). Finally, it would describe the format of monthly and quarterly management reports to be prepared for each employee record. Whether preparation of the payroll is to be performed manually or by a computer, the system is defined in terms of the items of information to be used and all accompanying plans for organizing, describing, and reporting those data elements.

Finally, the word "system" is often defined as a composite of the above three definitions, namely *a regulated, orderly method — which includes people, equipment, instructions, and data specifications* — used to accomplish a set of specific functions. Conceived in this manner, a system is a powerful tool comprised of many interrelated parts, each of which is necessary to accomplish a given task, including that of organizing and using management information.

What is an Information System?

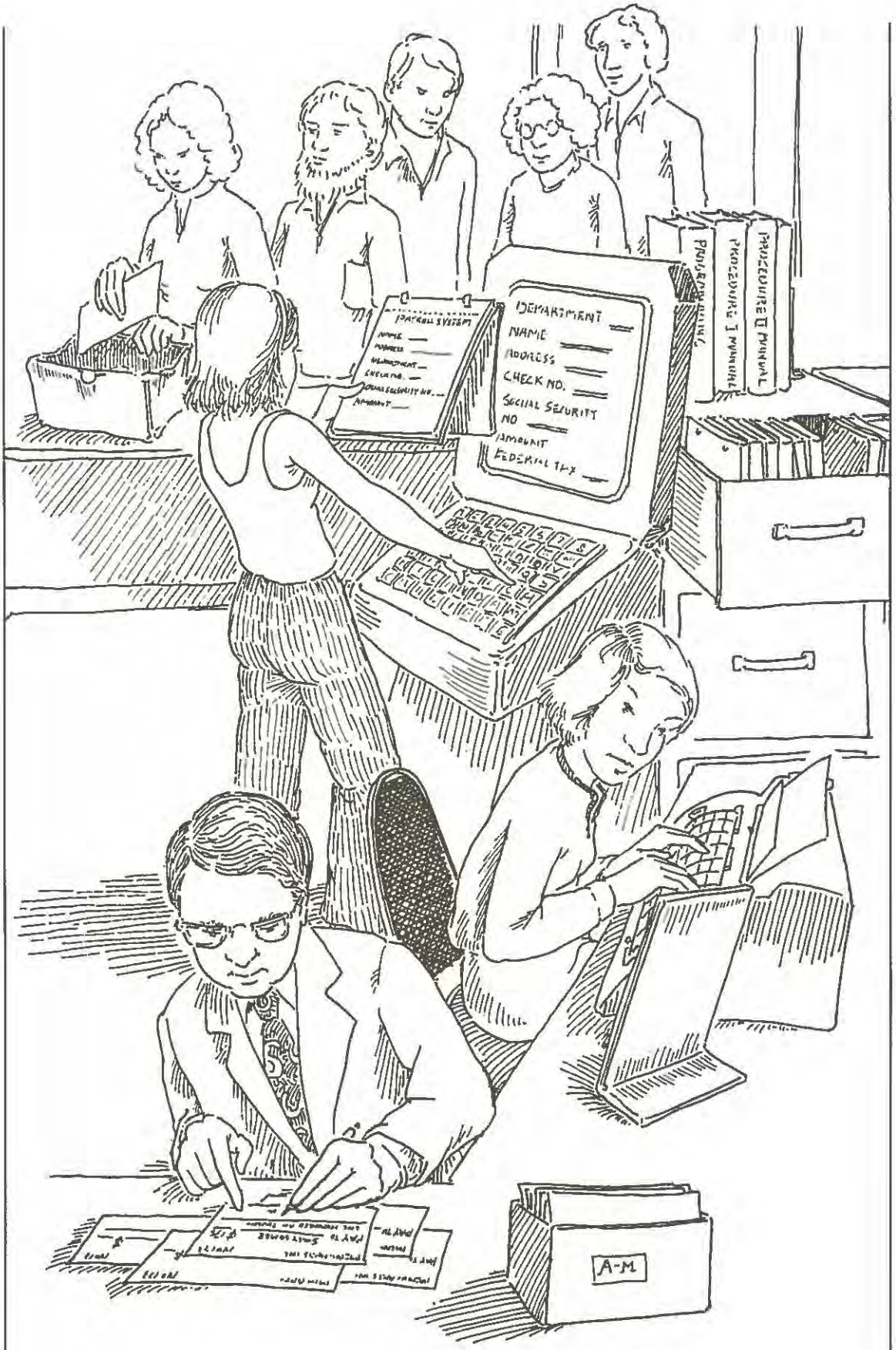
If we agree to define "system" in the broad sense described above, we are prepared to define an "information system" as any method — whether manual, mechanical, or electronic — for compiling and organizing similar pieces of data and performing specific procedures in order to serve the management and information needs of an individual or organization. Such systems might include:

- files
- logsheets or logbooks
- index cards
- procedures manuals
- lists
- directories
- office equipment
- computers.

They might be used for:

- commercial orders and billing
- inventory
- mailing
- research
- bookkeeping
- scheduling
- subscriptions
- grants management.

Effective information systems are those able to provide accurate, reliable answers with the greatest efficiency and speed and at the lowest cost. *Accuracy* and *efficiency*, for example, are essential to a business beset by financial difficulties. A good accounting system must provide cash balances, accounts receivable, accounts payable, and other asset and liability figures if managers are to make timely and well-informed decisions. Likewise *speed* is crucial to such businesses as stock exchanges, airlines, and wire services which rely on the ability to receive and transmit information instantly. And to the small agency trying to supplement its limited staff and budget with organized information, a system's *cost* is of utmost concern. What will it gain from an expensive,



What is an Information System?

sophisticated information system if it lacks the funds to implement decisions based on data which the system provides? Performance, timeliness, and cost are factors which surface repeatedly in any consideration of methods for compiling data and performing procedures to serve an agency's management information needs.

As we have seen, information systems are composed of many parts, including people, machines, instructions, and data specifications. These parts work together as an organized whole to accomplish specific functions. Let us look at some examples of manual, mechanical, and electronic information systems, considering typical system components, how each system stores necessary data, and what activities each performs to organize and process management information.

Manual Information Systems

Manual information systems are those in which most specialized functions — like storing and sorting data or performing calculations and printing results — are performed manually by an operator who uses conventional equipment or simple tools. They include filing systems in which special tabs or dividers help organize information by specific categories, color-coded index card files, addresses typed on matrices and photocopied onto labels, and punched card systems using special tools for sorting and selecting.

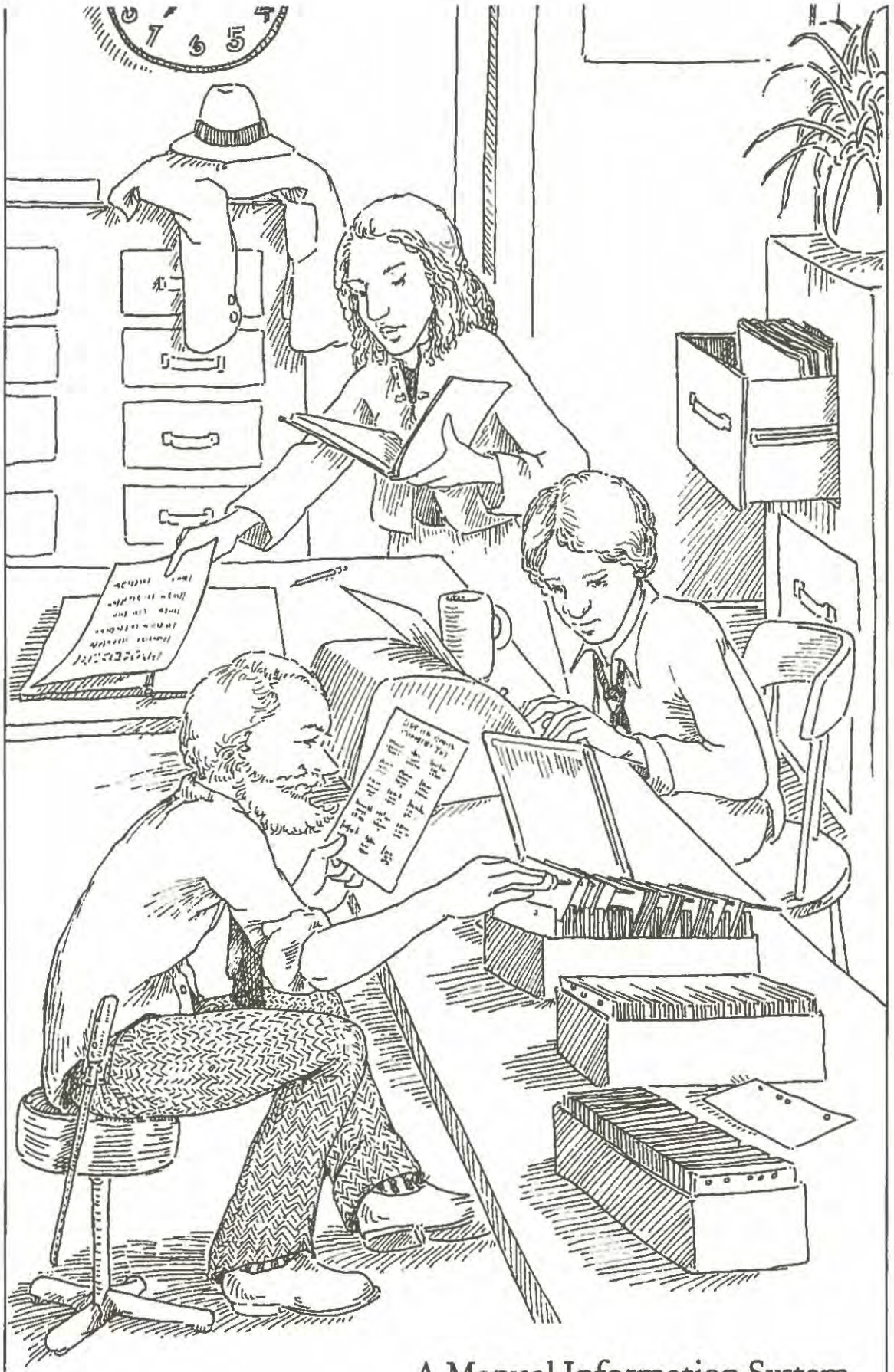
We have already seen the components of a typical manual system for processing a company's payroll. It includes standard office equipment, a payroll clerk, a list of instructions, and records about each employee to be paid. Information is stored in several locations: basic data about each employee (e.g., his name, address, pay rate, deductions, income to date) are filed alphabetically in a file drawer; the clerk's "In" box contains a pile of time cards with data relevant to preparing this week's payroll (e.g., hours worked); and the clerk's memoty may contain information about potential problems or exceptions not listed in the procedures manual.

Let us look for a moment at the activities the clerk will perform to organize and process payroll information manually. When he sits down at his desk, he first will sort all the time cards in his "In" box so that they are in the same order as the employee records in his file drawer. That step accomplished, he will take the first time card from the "In" box and the matching employee record from the file. Referring to his list of instructions, he will learn that he must multiply the number of hours worked (drawn from the time card) by the employee's pay rate (drawn from the file record) and subtract all deductions (also from the file record). With numbers and functions supplied by the clerk, a calculator performs the necessary arithmetic and indicates the week's total pay. The clerk uses his typewriter to prepare a check, proofreads his work to make certain there are no errors, and puts the completed check in his "Out" box for the treasurer to sign later that day. Before he goes on to the next time card, the clerk will update the first employee's record and replace it in the file drawer.

In this series of rather routine steps, the payroll clerk has participated in procedures common to all information systems: "input" is supplied by the time cards, data are manipulated according to a special set of instructions, and "output" is prepared on the typewriter and put aside for later use.

Another example of a manual information system is a McBee Keysort system. The components of such a system are specially prepared cards with pre-punched holes grouped by unique categories on all four sides, a hand punch for edge-notching the cards, a pointed rod like an ice pick for sorting the cards and selecting certain of them, and an operator to perform all necessary activities. The cards come in a variety of sizes and are stored in fitted boxes or cabinets.

How would a Keysort information system be used, for example, to monitor subscription renewals for an agency's monthly newsletter? Cards would be printed with space for a subscriber to write his name, address, the date, and amount of payment. Holes along the top of the card would be marked for subscriber type — "Student," "Organization," or "Member"; those along one side would be labeled by month, and those on the other side would be reserved for the year — '81, '82, '83, etc. When the system operator receives a subscription card in the mail, she will use a hand punch to notch the card's edges, thereby describing the subscriber and indicating when the subscription will expire. If, for example, an organization paid to receive the newsletter through November, 1981, she will notch the card by "Organization," "November," and "'81," and file it alphabetically under the subscriber's name. Then in September, 1981, if she wishes to invite all subscribers with November expiration dates to renew their subscriptions, she will take her Keysort needle and run it through the "'81" position of all cards in her file. As she lifts the needle, all notched cards — those whose subscriptions expire in 1981 — will fall away. She will continue the process by inserting the needle through the "November" position of the 1981 cards, and finally sorting the remaining cards into piles by "Student," "Organization," and "Member." The organization whose subscription will expire in November, 1981, will be sent a letter advertising



A Manual Information System

the newsletter's "Organization" subscription rate. Its card will be refiled until November. Then if a renewal payment has not been received, the operator will perform the same procedure to select the card and have the organization's name removed from the newsletter mailing list.

Again we have seen a typical manual information system in operation: subscription cards supply input, notching and filing procedures organize information in a useful format, and the Keysort needle produces the system's specially selected output.

Mechanical Information Systems

Mechanical information systems are those in which most specialized functions are performed by machines with moving parts which may or may not be electrically powered. This includes automatic addressing machines, the equipment used to "read" multiple-choice question answers on tests administered by national testing services, punched card sorting systems, and most older office equipment. We will look briefly at three examples of mechanical information systems.

Electric accounting machines, which look like large typewriters with lots of extra keys and settings, are available to perform a variety of bookkeeping functions, including sales accounting, accounts payable, cash receipts and disbursements, and payroll. When given appropriate data by an operator, they can produce invoices, post transactions, update ledgers, perform calculations, and print the results in the proper spaces and columns of special forms. Despite this impressive array of capabilities, however, these mechanical accounting systems are not significantly different from the manual system over which the payroll clerk presides. Information is gathered and organized by the operator, input manually, and stored in files and on paper. The major difference is that what used to be separate functions of the calculator (determining pay), the typewriter (printing output), and the clerk (updating the employee's record), are now performed quickly and efficiently by one machine.

An Addressograph system illustrates one type of mechanical information system used to print names and addresses on mail. These systems include a metal plate for each recipient on the mailing list, a machine which makes the plates, an Addressograph machine which does the printing, and an operator to run the equipment. The metal plates are stored in special drawers where they can be labeled and sorted as the user desires. Once the plates and mail to be addressed are loaded into the machine, however, further data manipulation is not possible. Again we have an example of a mechanical system which contains many manual functions. While most conventional addressing methods do not match the speed of an Addressograph, updating, sorting, and selecting plates for printing, as well as loading and operating the machine, must still be done by hand.

Finally, a Scriptomatic addressing system is an example of an information system which prints with paper cards rather than with metal plates the address records typed by the user. A long-lasting carbon impression of the name and address is transferred from the card to the mail by a Scriptomatic machine. Nearly all system functions except the actual addressing are performed manually. Some models help the operator a little — he can skip some cards with the push of a button or a signal can summon him when all names within a certain ZIP Code have been addressed — and some have electronic sensing units which "read" special codes marked on the cards, thereby expanding selection capabilities considerably.

In the case of both manual and mechanical information systems, data are usually maintained on paper, card, or metal and filed in drawers and boxes. Activities necessary for preparing, organizing, and processing the information are usually performed manually. Calculators assist with arithmetical operations, but both the numbers and accompanying instructions must be entered by hand each time a calculation is required. Output is obviously faster and more efficient in mechanical systems, but it must always be controlled manually and the options for variation are few.

Electronic Information Systems

Electronic information systems are those in which the essential tasks of organizing, manipulating, and storing information are performed by electronic computers. Computers are good at handling large masses of information which would otherwise be too complicated or time-consuming to organize and analyze efficiently. For example, scientists use computers to perform complex calculations such as determining a rocket's trajectory using data on gravity, weight, air resistance, and numerous other factors. Furthermore, computers can perform these tasks very quickly. Using a computer, a law enforcement officer can check out the license number of a car stopped at a traffic light before the light turns green, for example. And a business that once required a hundred clerks and a full week to process its ten thousand payroll records can perform the same procedures in several hours on its computer.

A Mechanical Information System

Like the manual and mechanical systems discussed above, electronic (computer) information systems include the people, equipment, instructions, and data specifications necessary to organize and process management data. However, since the equipment and instructions used by computer systems differ vastly from those considered in our previous examples, we will devote special attention to them here.

Computer system equipment includes special devices for data input, output, storage, and processing. In the language of the field, this equipment is called *hardware*. Hardware is of no use, however, unless it has very explicit instructions designed to make it function properly. Such instructions or procedures written in specific, detailed sequence and in a manner intelligible to a computer are called *programs*. Groups or sets of programs, which together control all computer operations and explain how to perform all activities and calculations, are called *software*. On the following pages we will look closely at the hardware and software appropriate to computer information systems.

Hardware

The hardware components of a computer information system are:

- input devices by which the computer receives data from an outside source;
- output devices by which the computer communicates with the user, either with information shown for temporary reference or recorded for future use;
- storage devices to maintain data for future use in a machine-readable manner;
- a processor which actually performs the organizing and calculating procedures necessary to provide useful management information.

Input and Output Devices

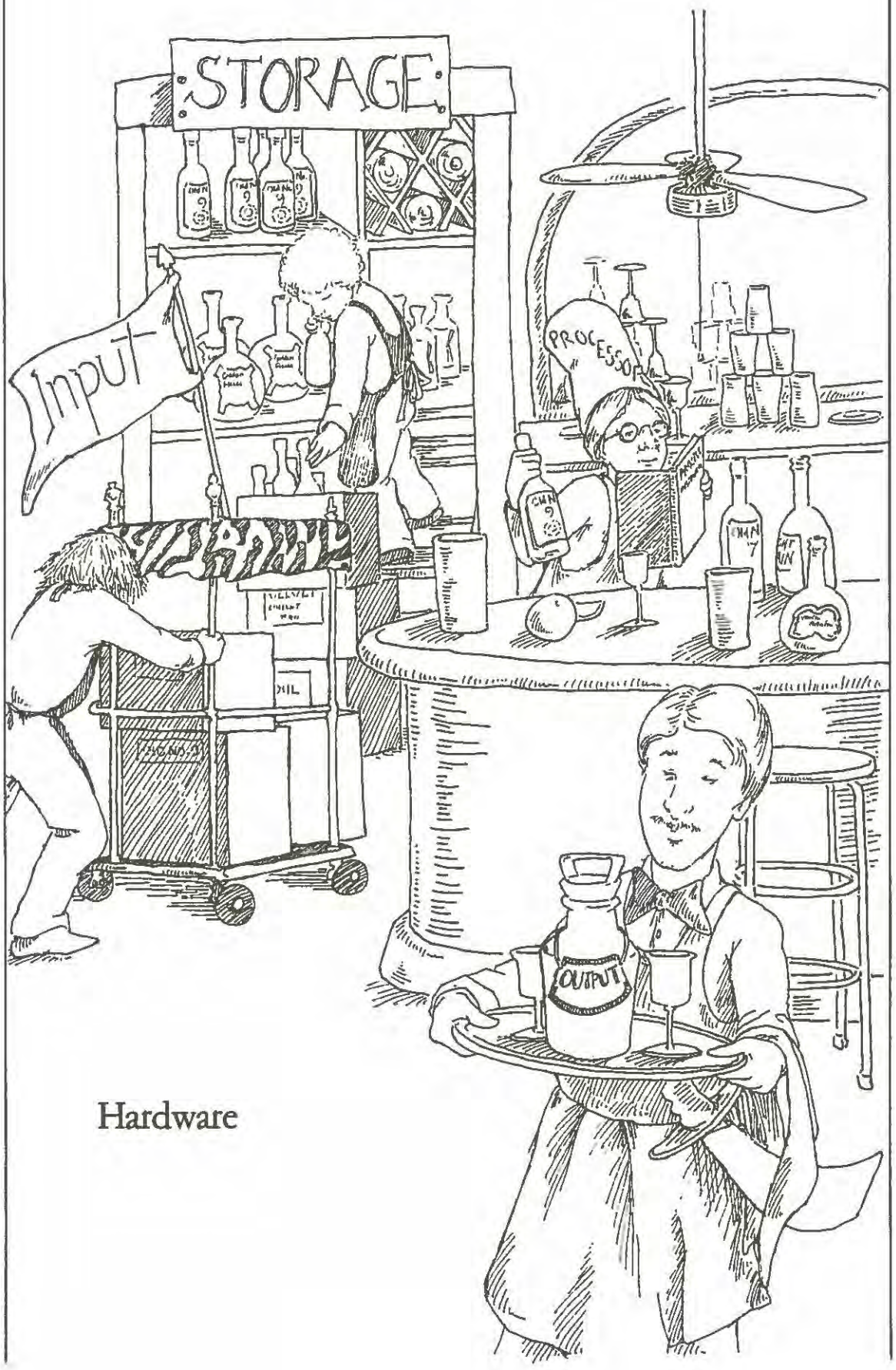
Input and output devices, usually called *terminals*, are used to communicate with a computer and receive information from it. As we will see, some types of input and output equipment can only "talk" or "listen" to a computer; others can do both.

The most common input device or terminal is a typewriter-style keyboard on which the user types the information he wishes to send to the computer. Specially manufactured keyboards sometimes simplify the process a user must follow to enter data and expand the equipment's capabilities. Computerized supermarket cash registers which have special keys to distinguish "Grocery," "Dairy," and "Deli" purchases and which total non-taxable items separately, are special-use terminals. Other examples are the unique keyboards used to record deposits and withdrawals in banks, make airline reservations, and distinguish cash and charge sales in department stores.

Another common computer system input device is a card reader, which sends coded information to the computer. Data entered in this manner require special preparation in advance. A keypunch machine is used to punch holes — each representing one character — in paper cards designed for this purpose. An operator then feeds the cards into the card reader, which "reads" the coded data into the computer.

Input keyboards are often connected to or combined with output devices, that is, to equipment which allows the computer to communicate with the system's user. In such cases, the computer can assist the person entering data by asking questions or requiring specific responses, and by allowing him to verify that the machine actually received the data he sent. Some input / output terminals look and function like typewriters: the user types his data on the keyboard, and the computer responds by printing a copy of the data and related questions or instructions on the paper in the machine's carriage. A Teletype machine is a familiar example of a printing terminal. Also well-known is the "television screen" terminal, or *CRT* (cathode ray tube), which provides temporary access to data being entered into or received from a computer. When the CRT is switched off, the output disappears from the screen.

A printer is a common terminal which does not allow user interaction with the computer but does produce a written record (known as *hard copy*) of the system's output. It looks like a typewriter without a keyboard and can print data on various sizes of paper or other media. Printers are manufactured to print at varying speeds: "character printers," which print only one character at a time, are slower then either "line printers," which print an entire line, or sophisticated photographic printers, which produce entire pages at once. Some printers use conventional type — like that of a typewriter — while others ("dot-matrix" printers) form letters and numbers from an arrangement of tiny dots.



Hardware

Storage Devices

Unlike the manual and mechanical systems whose only storage media were paper cards and files or metal plates, computer information systems can store data in a variety of ways, including on punched cards, magnetic tape, disks, and diskettes. Information stored in this fashion is unintelligible to a human being — the way music on a phonograph record and voices on a tape recorder cassette are unintelligible — unless translated by the computer and displayed on a CRT or printed. *Punched cards* used to be the most common form of long-term data storage. However they require a lot of shelf space and their popularity waned rapidly as better storage media became available and affordable. Large reels of *magnetic tape* store data in the form of electronic signals, similar to high-speed dots and dashes of Morse Code. Speed of access to information stored on magnetic tape is limited by the fact that to find a certain bit of data — say a single name on a mailing list — the computer must pass all preceding names and addresses until it arrives at the one it is seeking. The use of a *disk*, which looks like a phonograph record and stores electronic signals in tiny concentric rings, avoids this problem. While the disk spins at high-speed, a computer's disk reader can move back and forth along the disk's radius to locate the exact spot where each piece of data is stored. Unlike disks, which are installed in computers and often are not removable, *diskettes* (or "floppy disks") are easy to remove and store on the shelf or send through the mail. Diskettes function like disks but are flexible, smaller (about the size of a 45 rpm record), and somewhat slower. And although they eventually wear out, they are enjoying increasing popularity as an inexpensive, easy-to-use computer storage medium.

Processors

Let us think back for a moment to the manual and mechanical systems we examined. In each case, people performed most of the activities necessary to organize information in useful form. They filed, sorted, and refiled paper records; they compared names and numbers, ran calculators, and updated files. They surveyed all of the data in their information systems and selected and manipulated that which was needed to produce a check, renew a subscription, address a letter. But once data are put into a computer system, who or what performs all of these functions? The answer is the computer's processor or *CPU* (central processing unit).

A processor is composed of electronic circuitry which interprets instructions given to the computer and executes them quickly and accurately in exactly the sequence specified. It "listens" to information coming from input devices and "talks" to output devices, but only in a manner prescribed by the instructions it has received. If it is told to store an address, it sends it to the computer's storage device. If it is instructed to add a column of numbers and print the total, it will do so. If it must put two words in alphabetical order, it will. Some processors are faster than others, but even the "slow" ones are so fast they far exceed the speed with which humans can perform the same tasks. Unlike humans, however, processors cannot decide how or why they will do something. They simply do what they are told.

Processors have working space — analogous to the payroll clerk's desk top — which provides temporary storage for the instructions and data they are working on at a given moment. This temporary storage is called the processor's *memory*. If, for example, the payroll clerk had simply typed data from an employee time card into a computer instead of

- comparing the card with the employee's record,
- checking the procedures manual,
- performing a calculation,
- typing a check,
- updating the record,
- refiling the record,

the processor would have done the rest. It would have obtained the employee's record from storage plus its own relevant instructions and put them with the new data in its memory. There it would have performed the calculation, updated the record and sent it back to storage, and told the printer to print a check.

Both storage and memory must be of sufficient size to perform a system's computing. There must be enough storage to contain all of the data on which the computer will ever need to work. There must be enough memory to hold temporarily all of the information that will be examined at any one time. For example, in a mailing list of 11,000 people, storage must be sufficient for all 11,000 names and addresses at once. Memory must be large enough to store the one or two addresses that are being updated or printed at the moment, plus any instructions the computer is using to work on those addresses.

The basic unit of storage or memory is called a *byte* (pronounced "bite"). Each byte of storage or memory can contain one character of information, such as a "J" or a "2." It takes four bytes to store "ABCD" and eleven to store "HELLO THERE" (a space takes one byte). One thousand bytes is called a *K* (short for "kilobyte") so "32K" means 32,000 bytes or 32,000 characters of information. One million bytes is represented by *MB* (short for "megabyte") so "3MB" means 3,000,000 bytes or 3,000,000 characters. The mailing list of 11,000 names would require 1,430,000 bytes, or 1.43MB of storage if each address needed 130 bytes. A typical small computer memory holds 64K; diskettes hold from 100K to 900K, and a disk from 2MB to 64MB.

Let us review the hardware components of a computer information system. There are input and output devices used to communicate with the computer. There are storage devices where data are maintained when not in use, and a processor whose memory is the workspace for the system and whose complicated circuitry enables it to receive, understand, and execute instructions. Working together, the hardware provides a system able to handle large masses of information and perform complicated procedures with incredible speed and accuracy. We have learned, however, that without explicit instructions, the computer is powerless.

Software

People make computers perform according to their needs and desires through the use of computer programs — the detailed instructions which explain exactly what the computer must do to accomplish its work and how and when to do it. Just as the payroll clerk's procedures manual gave instructions for preparing paychecks, computer programs — which together comprise the system's software — enable the computer to do its computing. Once software is stored in the computer, instructions can be performed over and over without being entered each time.

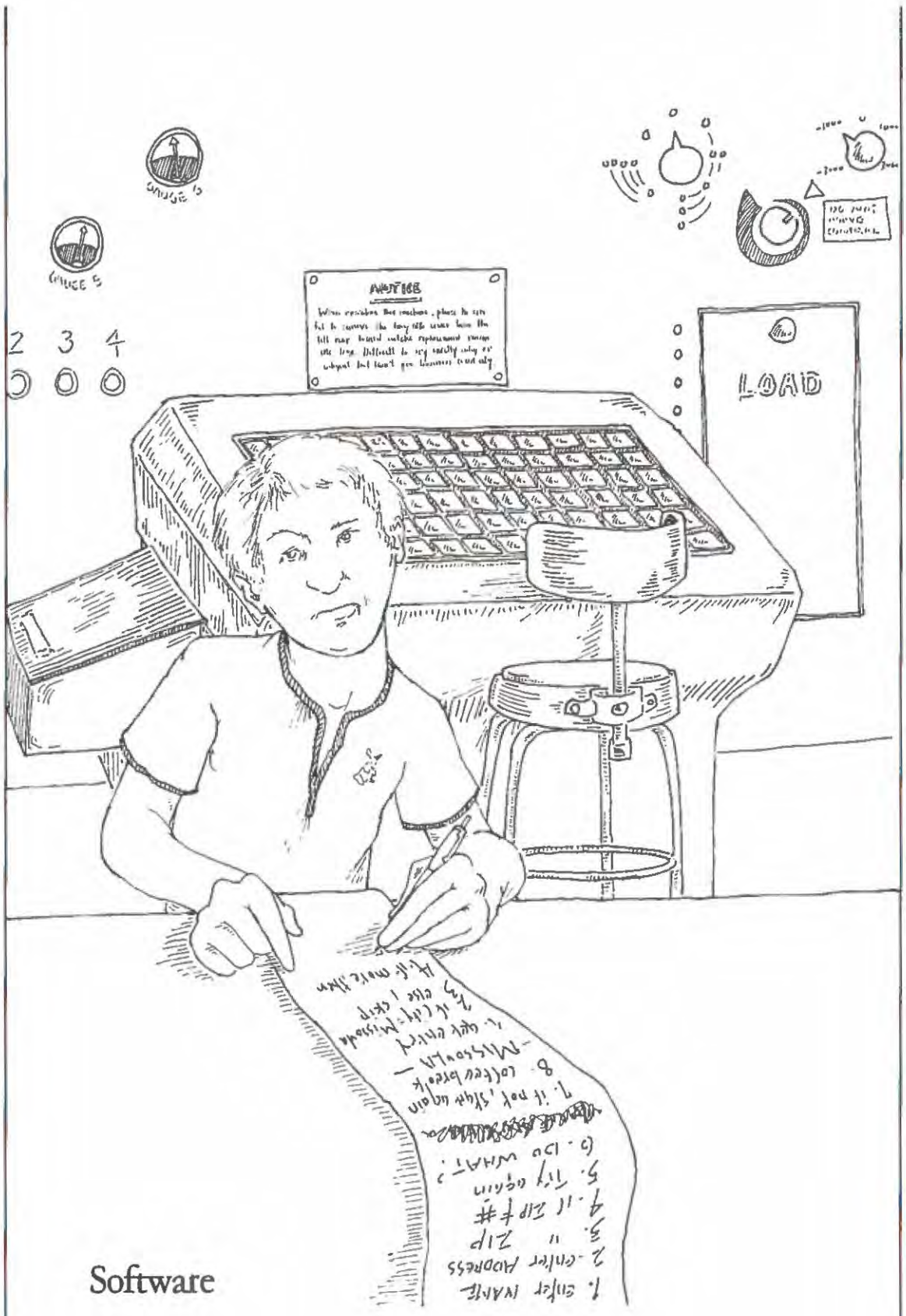
A computer program is much more detailed than a manual or mechanical information system's procedures booklet would be. Unlike a human being, a computer has no intelligence and cannot make judgments. Therefore, computer programs are written in extremely simple languages; they must compensate for the computer's limited vocabulary and inability to understand nuances or implied meaning. A computer would never understand, for example, that if a customer did not order any merchandise this month, a bill should not be sent. It must be told by a program that "if total amount due equals zero, do not print a bill."

While program languages are not spoken, they do use both words and symbols. Common computer terms are: GET, WRITE, READ, ADD, SUBTRACT, IF...THEN. A multitude of computer languages have been developed since the advent of electronic computing. The first major language was FORTRAN (Formula Translating System) which is used primarily by scientists for numerical work. BASIC (Beginner's All-Purpose Symbolic Instruction Code) is a simple language used on small computers; COBOL (Common Business-Oriented Language) is most widely used for business computer systems. Specialized languages are being invented evety year for particular applications and types of equipment.

While most computers can use several program languages, they cannot translate from one to another. Furthermore, a program written for one computer may not work in another using the same language without revision, because of variations in internal circuitry or different connections to input and output devices. Obviously, software development requires a great deal of specialized study and time, and the fact that computer professionals must use painstaking care in writing programs indicates why software is frequently the most expensive part of a computer information system.

Software must be designed to control and perform all functions associated with data input, storage, processing, and output. In a mailing list system, to use a common example, the computer must know which items of information (e.g., name, address, city, state, ZIP Code, mailing code) comprise a mailing list entry and how much storage space should be allocated to each. The user may wish to specify which items must *always* be present (e.g., name, ZIP Code, mailing code), and ask the computer to signal him if something is forgotten or entered incorrectly. Software should enable the computer to distinguish among the separate functions of adding, changing, and deleting names and addresses, and it may control how the user types the data into the system by specifying a certain order or displaying a form on the terminal screen for the user to fill in.

Software for a mailing list must also be able to tell the processor how to manipulate data stored in the system. If the user wishes to have a list in ZIP Code order, the computer must be told to examine evety ZIP Code and rearrange each entry in the proper sequence. The system may also be required to sort the list in alphabetical order by each person's surname. If this is the case, the computer must be shown how to distinguish surnames from first names and initials, and must even be told the order of letters in the alphabet.



Software

Finally, mailing list software must control output from the system — possibly in small quantities on a CRT, or printed on paper or labels. It may need to make certain that spaces are skipped between entries, for example, and that lists printed on labels are lined up to fit them correctly. At times the computer probably will be required to print only the entries from a certain state or only those interested in music, so it must be prepared to look at every entry and select those which meet specific criteria. It will need to schedule the printing when the user wishes, and finally to report how many names and addresses were printed, how many pages were used, and how long the task took.

When we consider that these are only some functions associated with a relatively simple application, it is evident how crucial computer software is to effective use of an entire information system.

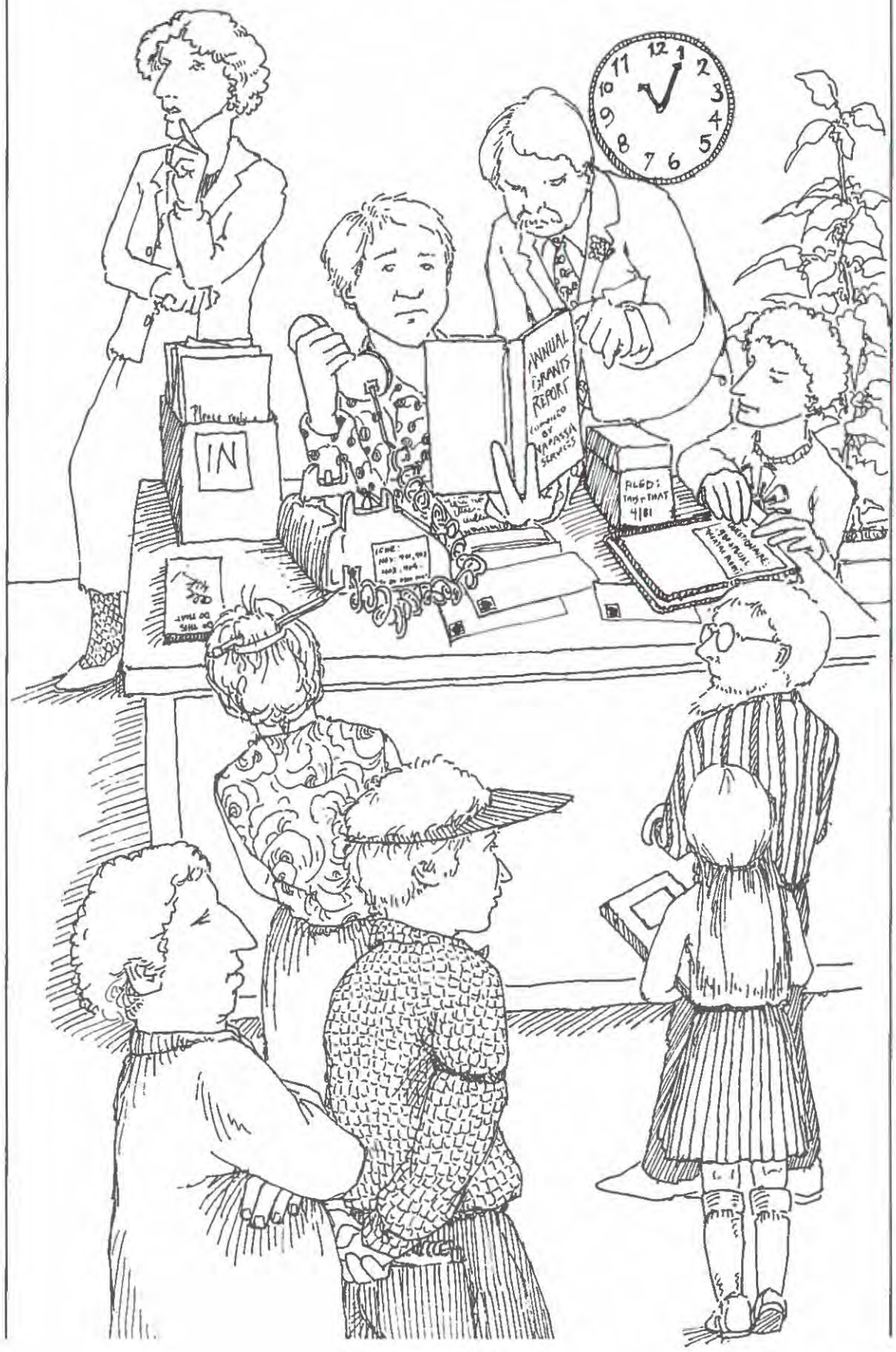
Word Processing Systems

Word processing systems are small, special-purpose electronic information systems designed primarily for manipulating text ("Twenty-five dance performances were funded by a grant of $10,000.") as opposed to the words ("dance"), facts ("25 performances"), and figures ("$10,000") that are commonly considered "data." Word processing hardware is similar to that used in general-purpose computer applications (a typewriter terminal, often a screen, a processor, and diskettes for storage), but specifically adapted for preparing letters and manuscripts. The software controls how the text is entered, corrected, organized on the page, and printed. It is usually pre-packaged by the manufacturer and cannot be altered. Word processing systems generally allow the user to search for certain words or groups of words, but they provide minimal ability to sort large amounts of data or perform calculations. While general purpose computers can usually be programmed to do the tasks of a word processor, an agency which needs *only* word processing will find typical packaged systems less expensive than a custom-programmed computer. On the other hand, where large amounts of data must be stored, listed, sorted, or otherwise manipulated — or the capacity to do so must be available in the future — a word processing system is not an appropriate choice.

Conclusion

It is evident from our study of information systems that they provide us with powerful tools in our search for methods to organize the information we need to carry out our jobs. They keep us from the chaos of being unable to find or do what is necessary to accomplish the task at hand. Information systems are not simple. A file here or a machine there will not automatically produce the data we desire. Although computer systems have greatly expanded our opportunities for solving difficult problems and handling large quantities of information quickly and accurately, they can do so only if information requirements are carefully defined and specified by the humans who will use them, much like the manual and mechanical systems which have existed for years. In evety instance, the objective of accurate, organized management information is unobtainable unless all essential parts of the system are working as a unit, each with a unique function and purpose.

The Need For Information



Chapter II

Toward Better Management: Information Systems in Public Arts Agencies

In the United States, the public arts structure consists of agencies at the federal, state, regional, and community levels that are charged with encouraging the growth and appreciation of the arts throughout the country. This network consists of the National Endowment for the Arts, fifty-six state and jurisdictional arts councils, eight nonprofit, multi-state organizations, and hundreds of community arts councils – all having similar purposes and programs. As agents of their respective government structures, and in conjunction with the American arts community, they act to stimulate the work of artists and arts organizations and to promote increased public understanding of and participation in the arts.

The Need for Information

Because public arts agencies offer similar programs and services, they have similar needs for efficient, effective methods of organizing data essential to their internal management, their constituents, and the funding sources to which they report. Let us review briefly exactly what these agencies do and what special information requirements they face. In fulfillment of their mandates from the public, arts agencies:

- give grants to artists and arts organizations,
- develop arts resource directories on artists, exhibits, facilities, and organizations,
- maintain events calendars,
- publish newsletters,
- conduct workshops and educational sessions,
- direct research projects,
- provide technical assistance to their constituents,
- engage in arts advocacy activities.

Despite enormous variety in the size of public arts agency budgets and staff, in the scope of their programs, and in the number of constituents they serve, participation in these activities produces a mutual need for information, which links them to their counterparts elsewhere in the country. In arts agencies, for example, information systems must enable staff people to:

- process grant applications through a variety of review, recommendation, approval, and funding steps;
- collect, organize, and distribute data on arts events occurring within a specific area and time period;
- respond to requests for information on a broad range of arts-related topics;
- maintain mailing lists capable of directing information to a variety of constituents;
- analyze historical data on programs and services for review and planning;
- manage their financial affairs according to public accounting standards;
- report to legislators, contributors, governing boards, and the public on the funds they disburse and services they render within specific programs, geographic or political regions, and arts disciplines.

The last decade's growth in direct public funding of the arts has left a mixed legacy: there are more dollars for both the arts and arts administration, and therefore presumably a greater capacity to carry out agency goals. At the same time, however, there are increased informational demands upon what is already an inherently inefficient delivery system.

Increases in public appropriations and private contributions have resulted in more grants and fellowships to artists and arts institutions, the establishment of more arts councils, and the participation of more citizens in arts education and experiences. At the same time there are more complex reports to file with prospective and actual funding sources, more recipients whose public-dollar spending must be monitored and audited, and more forms to complete before funds can be obtained or disbursed. Increased citizen awareness of public arts activities and access to data under freedom of information legislation intensify the need for public accountability, and a difficult economic climate makes accurate, accessible information all the more important in order to evaluate, plan, and justify any public arts dollars at all.

At the same time, arts agencies are left to manage their growing programs and reporting obligations with disproportionate increases in administrative budgets, and in a manner which, from a management point of view, is often cumbersome and labor-intensive. In his survey of state and regional arts agencies, John Urice discusses this inherent inefficiency by comparing arts agencies with other government divisions:

> Whereas an administrator in public health, welfare or transportation may dispense millions of dollars in one action to one recipient with a minimum of paperwork [an] arts agency with a few hundred thousand dollars in program money may disburse the funds to *hundreds* of organizations and individuals.*

In addition to making many small grants rather than a few large ones, arts agencies generally process all grants and service awards through review procedures which include various combinations of staff, panel, committee, and council or board members. Long cherished in the public arts funding network, these procedures add an extra layer of complexity and urgency to a growing need for arts management information.

A look at requests for information on a typical day at a state arts agency can illustrate where methods to collect, organize, and retrieve information are required and on what basis data must be available:

- a dance company manager needs a list of sponsors who might be interested in presenting his company during a spring tour of the state;
- a legislator asks why a museum in her district did not receive full funding for the exhibition planned for next fall;
- a junior high school student wants to know the name of the state song and where she can obtain a copy of it;
- the agency's director of performing arts asks the grants officer for a list of all grants awarded to schools during the previous funding cycle;
- a library planning next summer's arts festival wants the telephone number of a bagpipe ensemble;
- a list of artists' fellowships recommended by the visual arts panel is needed for the council meeting next week;
- the newsletter editor must have a list of events for the monthly calendar by Friday;
- four people — a weaver, a schoolteacher, a symphony orchestra manager, and the secretary of an architectural consulting firm — request information on the agency's programs and services;
- the executive director needs a report of the total funds granted last year in each arts discipline so he can make a presentation to the Division of the Budget tomorrow morning;
- the National Endowment for the Arts requests comment on its proposal to reorganize a major grant program;
- the associate director is circulating a memo asking for staff members' ideas on an arts economic impact study for the state.

These requests come in nearly equal numbers from within the agency, from constituents, and from governing bodies or funding sources. Several require immediate attention (the legislator should not be put on "hold" for fifteen minutes; the executive director will not be pleased if he gets his report as he leaves for the budget hearing), and most should receive a response within a few days. The list of panel recommendations and the calendar deadline could have been foreseen, but most requests are unpredictable. They require action at all levels of the staff structure, and some requests may have to be referred elsewhere

*John K. Urice, *Consultant's Report re Information Management Systems for State and Regional Arts Agencies* (1978), pp. 3-4.

(unless the person receiving the inquiry happens to know the state song or has a cousin who plays the bagpipes).

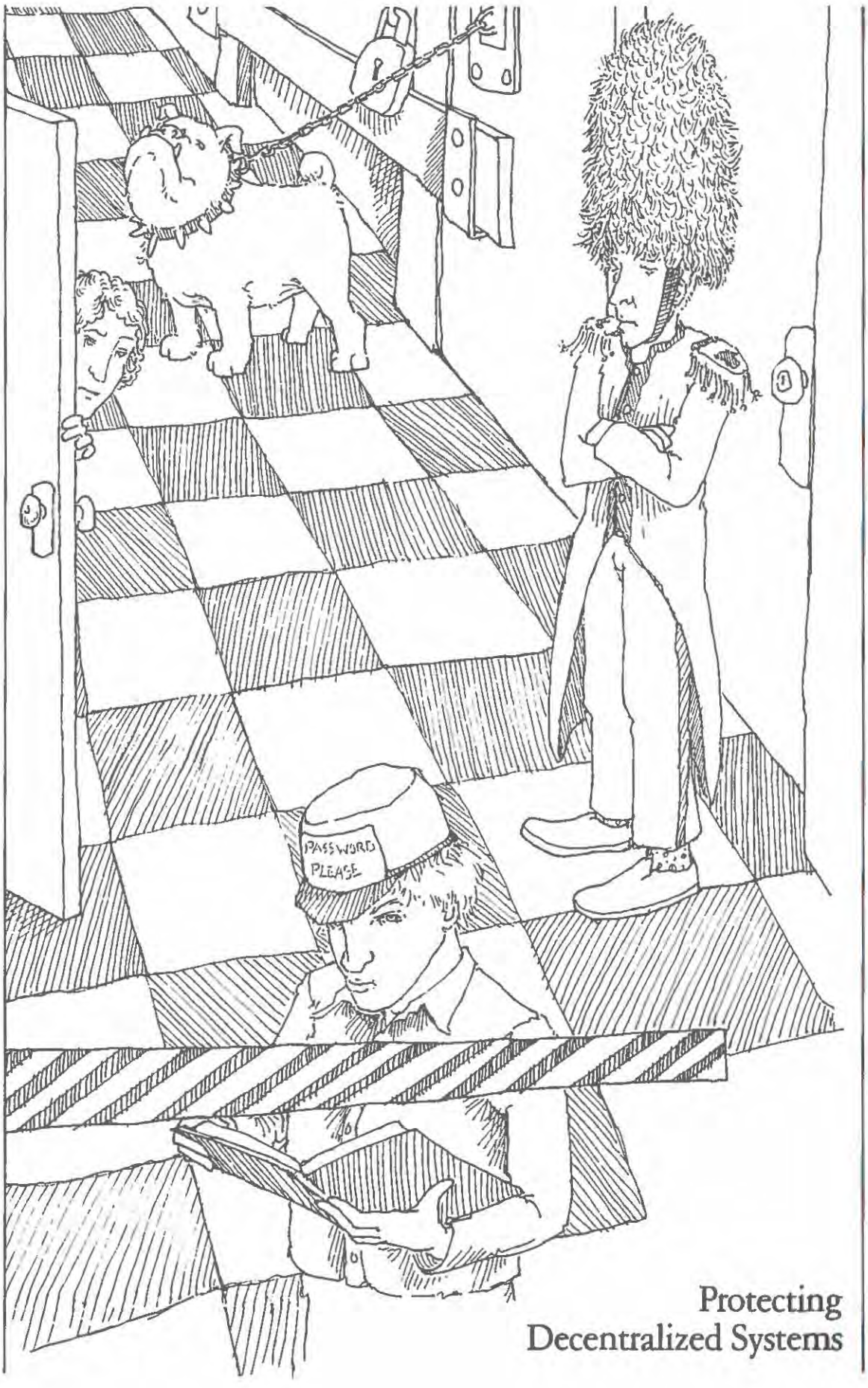
A well-managed public arts agency should be able to handle these information requests with ease. If the people, equipment, and procedures comprising this agency's information systems are functioning as they should, the legislator will receive a prompt, courteous response from a person familiar with the museum grant in question, the newsletter will get to the printer on time, and everyone will not have to stop what they are doing to make certain the executive director will have the facts straight during his speech tomorrow. An effective mailing system will insure that people contacting the agency for the first time will continue to receive information appropriate to their needs and interests, and it will identify many potential dance sponsors in the state. In addition, if the agency has developed directories of sponsoring organizations and performance facilities, the dance company manager will be pleased to learn the telephone numbers of people he can contact and whether they have an adequate budget, floor, and stage to present his company. The agency's grants management system will need to identify grants by applicant type (schools), program (artists' fellowships), fiscal year, and discipline, as well as maintain documentation on how and why funding decisions were made. Budget data from the grant system's organization file may be the place to begin selecting institutions to participate in the economic impact study, while historical grant data will indicate which constituents will not be served at all if funding criteria are revised at a national level. Finally, if the agency has an index of performers categorized by type, the library may not have to call the International Association of Bagpipe Players after all.

The Need for Improved Information Systems

It is an unfortunate fact, however, that many arts agencies are not able to handle their information requirements with ease and efficiency. Even routine requests like those described above can occupy the attention of key staff people for hours, days, and sometimes weeks as they laboriously sift through boxes, files, and meeting notes. It would be useful, therefore, to look at common obstacles to good information management, factors that contribute to the need for improvement, and symptoms which signal the warning that information systems require attention.

Public arts agency information systems — particularly those used for the essential tasks of mailing and grant-making — were frequently developed in a haphazard manner over several years and by many different people. As agencies identified new constituents and funding sources, accomplished specific tasks and moved on to new challenges, they added new programs, services, and staff. Often, each staff member had his own mailing list, files, and grants management system. Each grants system had its own guidelines, forms, logbooks, and review procedures. When agencies were very small with only one person assigned to each program area, these decentralized information systems worked well and to the apparent benefit of the staff and constituents alike. Among staff members, the freedom to revise a form, reorganize a file drawer, start a new mailing list, and put one's personal touch on even the most mundane aspects of running a program were often irresistible. At the same time, the one person assigned to performing arts programs knew *all* performing arts applicants, sponsors, chamber music groups, and nonprofit theatres in the region. Another, the visual arts staff member, was the person to call if you were wondering when a certain exhibit was opening, why the visual arts deadline was moved up a month, how soon you could expect your fellowship money, and whether the Picasso exhibit would tour again that season.

As time passes and agencies grow, however, the problems associated with these decentralized information systems become more apparent. Though arts agencies now have histories to analyze and futures to plan, historical data are buried in bulging files scattered throughout the office, and statistics on *all* programs according to common categories have often never been gathered. A mailing list of all constituents has to be collected from a half dozen desk drawers, and they contain duplicates where constituents and interests overlap. And an entire program is thrown into turmoil when its director leaves unexpectedly, with no time to explain his unique record-keeping procedures to his successor. Consequently, scattered reforms take place. The newsletter's editor computerizes his mailing list with a service bureau, the program director who processes the largest number of applications implements a punched card log system, and the office responsible for government liaison buys a memory typewriter to "personalize" its form letters to legislators. Now the staff members who have developed "good" information systems are protective of the new *status quo*, causing systems decentralization to become even more entrenched, while duplication and poor records management habits continue. And as if these obstacles are not sufficient to discourage public arts administrators, plans for comprehensive management improvement are sometimes thwarted by the government bureaucracy, workloads increase each year, and administrative budgets are cut.


PASSWORD
PLEASE

As agencies struggle to cope with inadequate information systems, their ability to handle daily routines and adhere to established policies and schedules deteriorates. If several staff people in the example above need to be diverted from their usual duties in order to sort through files, looking for last year's grants and totaling them by discipline, their other work will begin to pile up. When this continues to happen, staff members find themselves reeling from one crisis to another, tyrannized by impending deadlines and with little time for the planning, program development, evaluation, and constituent contact for which they were hired.

A number of factors can tax existing information systems to the point that intolerable conditions develop and arts administrators are forced to evaluate their agencies' ability to handle information:

- **an increase in agency operations**, such as a larger staff, budget, number of constituents, geographic region, or more programs, services, grants, telephone calls, and mail;
- **a change in agency focus** to include new and different activities; to require more information for planning, evaluation, program development; to add or increase an arts advocacy role;
- **a need to do things faster**, like respond to telephone and mail inquiries, make grant decisions, handle emergency mailings, get money to grantees, report to funding sources, prepare for panel meetings;
- **a need for increased control** over access to information, over spending and budget accountability, over program growth and outreach, over staff activities;
- **increased costs** for general and program administration, including staff, printing, mailing, supplies, program evaluation, and overhead expenses.

Arts administrators who can foresee these circumstances occurring in their agencies are indeed fortunate, for they can plan ahead to avoid the frustration and chaos of inadequate management information. However, there will probably come a time in every arts agency's history when some of the following symptoms and situations will signal the warning that the need for improved information systems can no longer be ignored:

- **Valid questions go unanswered for lack of data or personnel to get needed information.**
  A legislator calls to inquire about spending in his district during the previous year. His question cannot be answered because last year's grant application forms did not request a legislative district number, and compiling the data would require someone to compare 1,120 individual grant files with a map of political districts. There is no one with the time to do so.
- **Managers lack the data necessary to do planning and to evaluate operations and programs.**
  The performing arts staff and a consultant are evaluating a three-year-old touring program to determine whether it is true, as many say, that they have supported far more theatre and music tours than dance tours. Because all three disciplines are equally represented on the program, they wonder whether fewer dance applications were received or whether a higher percent were not funded. During three years the agency gave 3,092 grants; the records fill five two-drawer file cabinets and are not listed anywhere by performing group. If the grants officer must obtain this information, she will have to stop day-to-day activities for two weeks.
- **Administrative and support staff members fall behind in their work.**
  Yesterday's mail is not opened because the secretary is putting envelopes in ZIP Code order for a bulk mailing. The grants officer has not acknowledged last week's thirty-two grant applications because she is typing a summary page on each of 150 applications before sending them to the music panel. The fiscal officer missed deadlines for two federal grant final reports because the part-time bookkeeper has not finished his year-end financial statement.
- **Constituents complain about delays, inefficiency, and inability to get the information they desire.**
  There has been an increase in the number of grant recipient final reports containing negative comments about the agency: forms have gone to wrong addresses, grant award letters arrived late, checks were for the wrong amounts. Five of the board members did not receive a copy of the annual report. And an irate, well-known performing group wrote the newspaper complaining bitterly about "waste of public funds" because the results of a $23,700 project to collect data on the region's performance facilities two years ago are still unavailable.
- **Paperwork is increasing.**
  The performing arts director, fiscal officer, grants officer, bookkeeper, secretary, and government liaison are spending twenty percent of their time keeping duplicate logbooks, files, index cards, ledgers, and mailing lists. Each is determined never again to find himself without the information he needs.

To arts administrators in public agencies, these examples may sound like they come directly from their own calendars, staff meetings, and journals. If so, it is time to sit up and take notice. When agencies whose programs and information systems have been proliferating for ten or fifteen years encounter growing needs to evaluate, plan, report, and justify, and when they must serve their constituents with limited staff, time, and money, then they must find ways to upgrade their information management capabilities.

Improving Information Systems

Getting Organized

A good way for public arts agencies to begin the process of information systems improvement is by reviewing their purposes for existence, the goals they have established, and the strategies they have devised to accomplish these goals. This provides the agency with an opportunity to separate itself from the specific demands of the present and to concentrate on the more enduring reasons for managing information in the first place. Arts agencies must clarify which constituents they are proposing to serve by their programs and what information must be available both now and in the future — to the agency, its constituents, and others — in order to accomplish this.

Consider, for example, an agency which has identified as a primary goal serving individual artists in its region. In order to achieve this goal, the agency has decided to 1) award grants to help artists complete works in progress; 2) provide artists with regular information on relevant publications, competitions, awards, legal developments, grant deadlines, and marketing opportunities; and 3) learn more about local artists and seek new opportunities to be of service to them. In connection with its first objective, the agency must determine whether its grants management policies and procedures are responsive to the unique requirements of individual artists. Will a grant accomplish its intent, for instance, if the artist must wait six months for a decision and another three for a check? Or can this schedule be shortened? The agency's second objective assumes the ability to contact artists on a regular basis with a variety of news items. Is the agency's mailing system flexible and easy to use on short notice, and can it target mail to specific groups of individual artists? To accomplish its third objective, the agency may wish to gather data which will be useful for its own program planning and for increasing public awareness of local artists. How many artists live and work in the region? What types of activities are they engaged in? What are their special interests and concerns? Such a review of the environment in which an agency's information systems will be used is an excellent first step in getting organized for system improvement and development.

Arts agencies must also establish priorities with respect to determining what information will help them accomplish their goals and objectives. For example, the agency described above, whose inability to cope with information demands was so apparent, would need to answer questions like these *before* embarking on a project to correct information problems once and for all:

- Does it really matter if we cannot respond to that legislator?
- Is it important to know whether some constituents are better served by the touring program than others?
- Do we care how quickly the mail is opened and correspondence is acknowledged?
- Would our decisions be affected if the music panel were given less information?
- Is it important for us to complete all grant and fiscal reports on schedule?
- Which constituents are complaining, and are their complaints really valid?
- Is it more important to acknowledge grant applications immediately than it is to make sure every board member receives a copy of the annual report?
- Why are those facility questionnaires still in boxes in the storage room? If we could publish the results now, would we be interested in doing so?

Finally public arts agencies must take time to analyze the people, equipment, and procedures comprising their present information systems to determine exactly where the problems lie. Again, a few fundamental questions may offer some insights:

- What information systems currently exist? How do they function? What are they supposed to accomplish?
- Who is responsible for each system? Are too many, too few, or the wrong people involved? Is more than one person doing the same thing?
- How much time does handling information require and what does each system cost the agency every year?
- Is existing equipment adequate for the task at hand?

- Are procedures straightforward, well planned, and carefully scheduled? Or should they be reorganized to eliminate delays and poor records management?
- Does the agency collect information which is never used? If so, is this because people are not aware that the information exists, or because it is now obsolete?
- What information does each staff person need to do his job? Is it available easily and on time?

If an agency's needs for information are not being met according to carefully determined priorities, and if making existing information systems more efficient will not correct the problem, then it is time to plan, design, and implement new information systems.

Who Should be Involved?

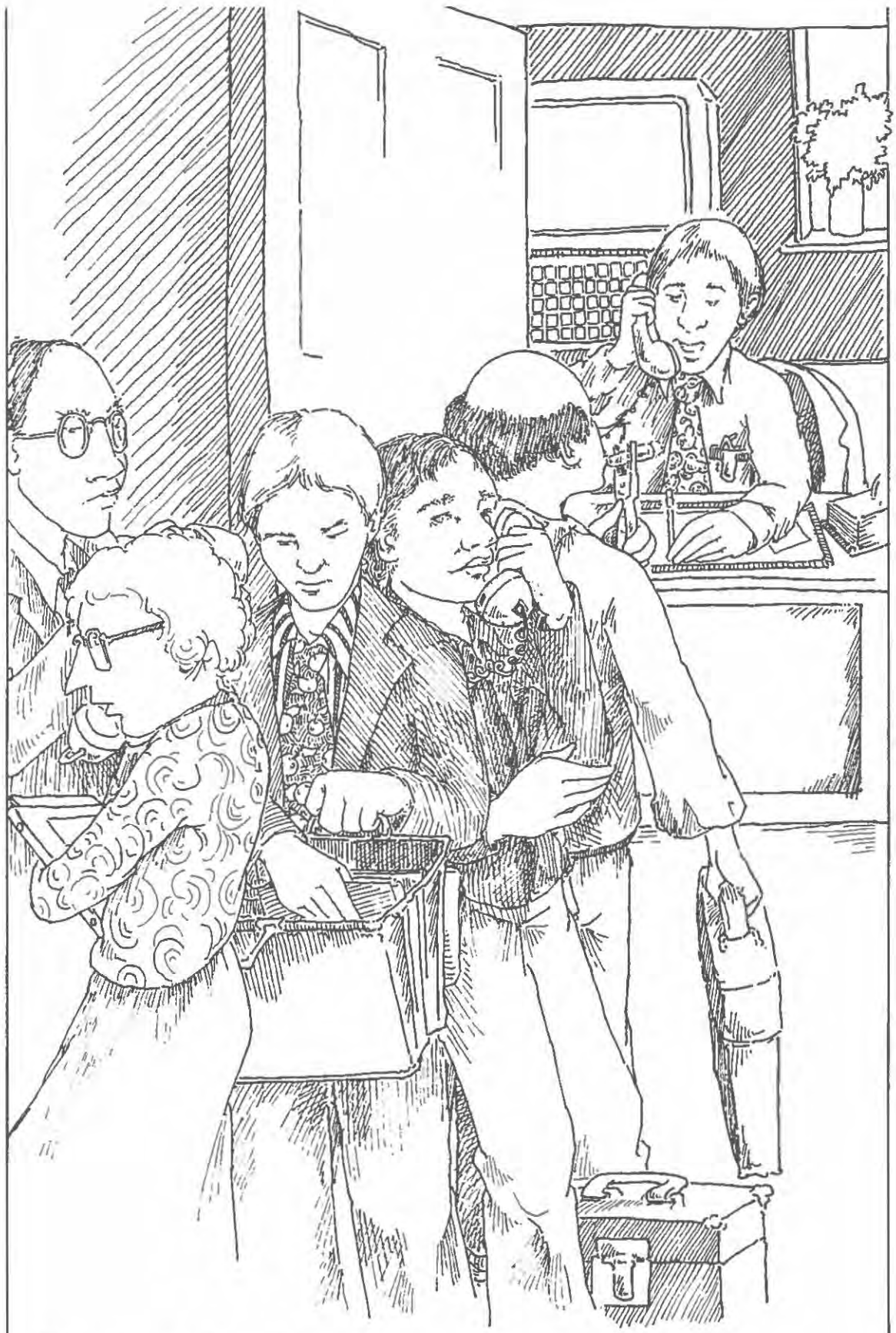
While all agency staff members must be knowledgeable about and involved in plans to improve or implement methods of handling information, it is essential that the process be initiated and directed by those who manage the agency. Why is this the case? Why should an agency's director and top program management people be responsible for designing information systems when it is the clerks and typists who mail brochures, fill out logsheets, and file documents? It is simply because good information systems provide the data necessary to plan, report, achieve goals, and evaluate agency activities. Such systems must work well together to insure that needs in different offices or departments are met. For example, the director of an agency may want legislative district information from a grants management system, a program administrator may require detailed audience statistics from the same system, while the grants officer may need a way to compare applicants' budgets and funding histories. In addition, managers should be involved in planning information systems since changes in how data are handled probably will require shifts in the staff structure as well as special time and financial commitments. These factors make it imperative that top administrators be in charge of the process. They are the people who are responsible for all operations; they will have to make decisions based on the information provided by the new systems; and they have an overview of all agency needs, staff capabilities, and financial resources. Only by being involved from the beginning can arts agency managers understand the strengths and limitations of every information system being considered, revised, or implemented.

What to Expect

There are no shortcuts in the task of improving information systems. It will take time and effort on everyone's part to examine agency functions with the intent of analyzing their effectiveness and devising plans for change. The process will be disruptive. Whether the agency merely gathers its dozen mailing lists and puts one person in charge of them, redesigns its grant application forms and installs a new filing system, or automates most of its information systems on a computer, there will be changes in routines which have been used for years. There may be resistance to such change; there may be confusion and paranoia: "Will I have more work to do?" "Will my job be eliminated?" "Will I be able to learn this well enough to keep my position?" "Will I have a new supervisor as a result of this?" Staff roles and responsibilities may have to be reorganized and people will have to get used to new ways of obtaining and providing management information.

For example, a properly implemented mailing list system revokes the right of every staff member to maintain his own "private" list. An effective system for managing the grant-making process requires that one person or department process all grant applications, monitor compliance with program guidelines and schedules, develop documents, maintain files, and provide all grant-related information. Each person will no longer be able to process "his" applications as he wishes.

Of course, situations which took years to develop will not be corrected overnight. Administrators should not expect a sudden flow of new and unusual information or the instant reduction of administrative expenses. If, for example, legislative district and arts discipline data are desired on past grants but were not gathered in previous years, they will have to be painstakingly constructed from the files. Furthermore, when a new mailing system is implemented, it will take a long time to make sure duplicates and errors are removed from the old system and each name is properly coded and added to the new one. In short, an extraordinary degree of foresight and patience will be required from everyone until management efficiency improves, costs are contained or reduced, and the agency's information needs and aspirations are finally met.



The Hassle Quotient

A Word About Computers

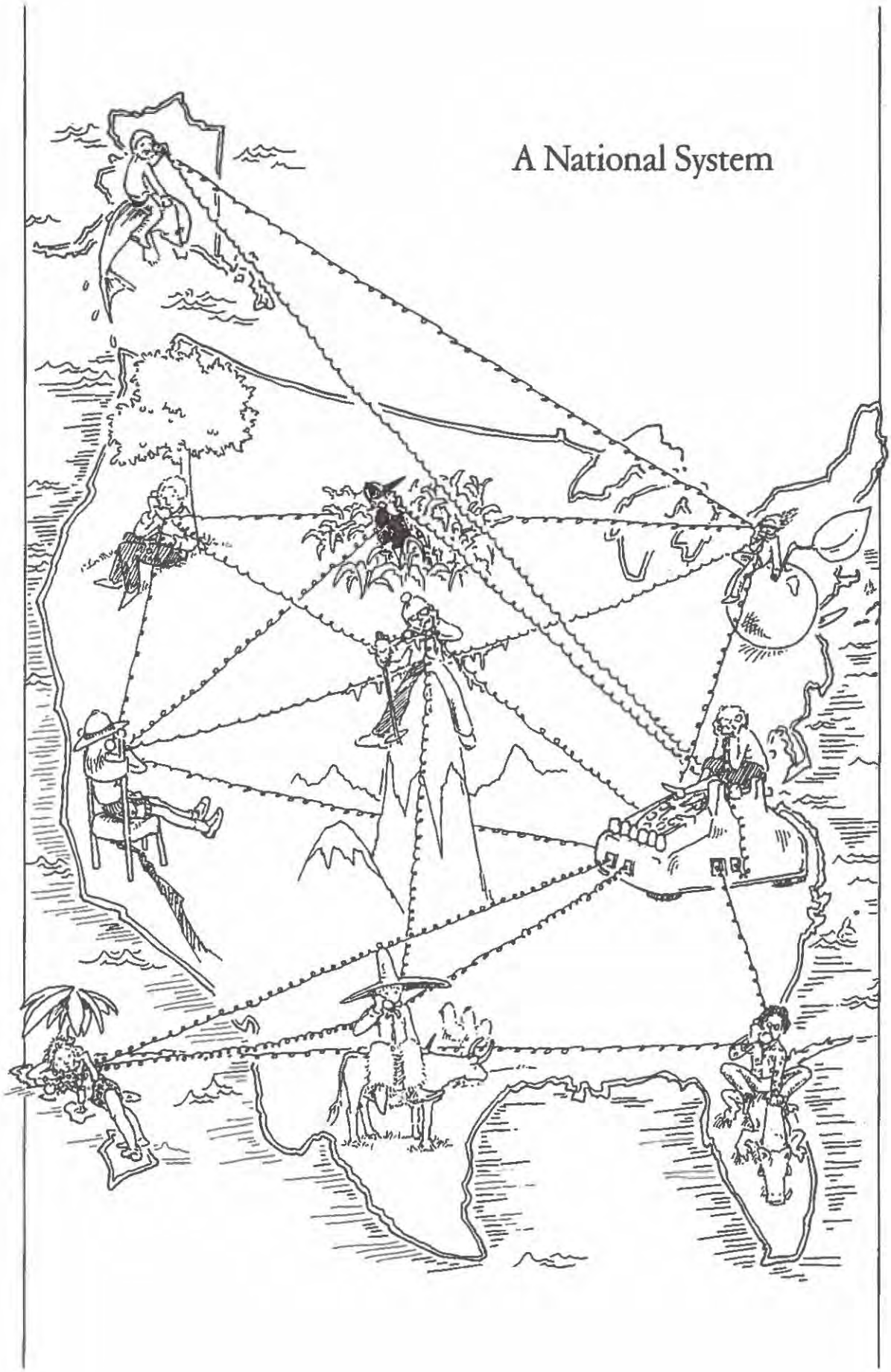
In public arts agencies, the computer's ability to solve difficult problems and handle large quantities of information quickly and accurately has obvious advantages. A mailing system which must select certain constituents and organize many addresses in ZIP Code order, a grant system which must provide data according to a complex array of variables, an index of performing arts facilities to be sorted by seating capacity and stage size, are all logical computer applications for arts agencies. What is not always obvious, however, is that *not every arts agency needs a computer* to handle its information requirements, and *not every problem can be solved by automation*. Talking about computers is premature if there are not well-documented needs for the type of information best provided by a computer, and to assume a computer is needed in the office is dangerous. Upon close analysis, agencies may find that their needs can be met by better manual systems, mechanical equipment, or computer services shared with or provided by others. The decision to obtain a computer should be made only after extensive planning and reorganization. It is not, after all, like buying a typewriter.

It may be valuable to remind ourselves that *manual systems are better than computers — if they are effective*. They are easily adaptable, do not fall under government procurement rules, are well-loved by staff people, and are not reliant on repair people, air-conditioning, or the mood of the electric company. Reduced to its simplest terms, the difference is summarized in this bit of advice: if you have the choice between two systems, one manual and one electronic, and both are adequately effective and cost about the same, choose the manual system; it is free of the "hassle quotient." The "hassle quotient" guarantees that one-fifth to five-fifths of your time with an electronic system will be spent in pain — with the sales people, the programmer, the manufacturer, the distributor, the trainer, the repair people, the phone company, the air-conditioner, the electrician, the operator, and the boss. So get a computer if you need one, but don't assume that you do, and be prepared if you don't.

Conclusion

It is not surprising that public arts administrators are focusing more and more on information systems and management capabilities. The growing pressure for accurate, sophisticated information has encouraged them to explore new ways to meet their needs within budget and staff restrictions without compromising their organizational purposes or effectiveness. They suspect that improved methods for compiling and organizing data may be the key to better management. But the task of determining what information they need and why they need it is a difficult one. It is true that computer technology offers an array of tempting possibilities previously unavailable to small agencies. But as we have noted, computer, manual, and mechanical systems alike can help public arts agencies face future challenges only if they are chosen and designed by administrators who have fully determined their needs and have established priorities for what information is most important. These decisions must be made in a context where planners are not permitted to forget that more information will not insure better answers, that accurate statistics do not guarantee wise decisions, and that improved management capabilities are only one aid to help public arts agencies serve the arts in this country.

A National System



Chapter III

Toward National Compatibility: The National Standard for Arts Information Exchange

The need for a national system of telephone numbers is usually conceded without debate. But let us imagine for a moment what it would be like to make long-distance calls if, instead of one national system, every town and city had a different method for identifying and locating telephone customers. First, there would be no Area Codes or national Directory Assistance numbers. A caller in Cleveland would simply have to know how to get in touch with a telephone operator in Sacramento. Then, when he requests the Pacific Life Insurance Company's telephone number, he would be surprised to hear the operator ask for the firm's address. In Sacramento, as it turns out, the telephone company assigns numbers according to each customer's street. Further investigation reveals that to contact the New Orleans Chamber of Commerce, one must name the organization's parish, while in Tallahassee, a county code number will suffice. Operators in Washington, D.C. need a customer's FEI or Social Security Number to place a call, in New York they want the last three digits of his ZIP Code, and in Chicago the telephone system is organized by precinct. Finally, many towns have no Directory Assistance at all, and the telephone numbers themselves vary in length from two to twenty-one digits. A few moments spent pondering the utter chaos such circumstances would produce are enough to make us immensely relieved, when we dial an Area Code and seven standard numbers, to hear the familiar question: "What city, please?"

If the people who use telephones to call their friends and conduct their business affairs benefit so readily from a national numbering system, perhaps organizations which offer similar programs and services and which use the same kinds of data might also profit from common solutions to their information management problems. For example, are there advantages to arts councils in having standard methods for coding the constituents to whom they mail their guidelines and newsletters? Would there be value in using similar categories for the budget data on arts agency grant program application forms? And more importantly, do public arts agencies collectively have information needs which demand that their efforts in information systems development extend beyond simply solving the problems that they encounter every day and that are limited to the boundaries of their states and regions?

The Need for Compatibility

The National Information Systems Project (NISP) was born of a conviction that national dialogue among public arts agencies was essential to the future of their effective data management. A feasibility study which preceded NISP surveyed arts agency information needs and systems and found the field filled with interest and activity. Arts administrators were devising a variety of systems to solve their information needs. Some had already taken major steps in developing sophisticated computer systems; others were

making commitments to purchase equipment or design software; and many were eager to embark upon similar projects in the near future. The study also found a degree of similarity in the existing systems, for although those systems were developed in relative isolation, the agencies were, after all, engaged in similar arts service and advocacy activities.

But the differences rather than the similarities in the systems being developed attracted the most attention and concern. Consider, for example, two arts agencies with information systems for collecting data on grant programs. In one, money awarded directly to an opera company for a five-state tour was recorded as a grant for "touring." The other agency called it "touring" when a community college sponsored the same opera company using arts agency money. Furthermore, the first agency was accustomed to having its music panel review grant applications for opera events, so when the National Endowment for the Arts conducted a survey of "music" grants awarded by arts agencies, the opera company grant was included. The second agency participated in the same survey, but did not list the opera residency at the community college since its grants management system categorized this grant as "musical theatre." To further complicate the picture, the first agency received a grant application from the opera company in which the chartered tour bus contributed by a local company was listed in the project budget as "revenue" to match arts agency funds. In the case of the second agency, donated hotel accommodations for the artists were not considered part of the total project revenue.

These differences appear small and would be of little consequence if public arts agencies had no occasion to communicate with each other about their activities. But this is not the case. From the beginning, these agencies have been interrelated by funding networks and cooperative programming which necessitate reporting similar data about disbursements in similar funding categories. With the recent growth of regional arts agency consortia, administrators increasingly are required to compare constituents, programs, funding activities, and arts resources to do essential regional planning and program development. Research projects are drawing upon data available in entire regions or groups of regions. Public arts agencies frequently are providing information services using directories of galleries, performance spaces, sponsors, and arts events in an effort to expedite cultural exchanges and attract tourists as potential arts consumers. And as we have already noted, increased insistence on accountability at all levels of the funding network is affecting the type and quality of information required of everyone.

In this context, even minor discrepancies in the way information is categorized and reported are of concern. It would be impossible, for example, for arts agencies and service organizations to compare types of grant program activities and numbers of private dollars generated to match public monies if the data they used were compiled without standard terms and definitions. A theatre company which obtained five performing arts facility directories for the area it wished to tour, only to discover five different methods of listing stage dimensions, would be more confused than helped. And the service organization doing national research on specific craft activities would have a difficult time locating craftspeople if the fifty-six mailing lists it received did not separate artists from arts organizations and had no common way of distinguishing between crafts and folk arts.

Thus the growing need for a pool of reliable, consistent information, providing regional and national perspectives on public arts activities in America, led the consultant conducting the NISP feasibility study to conclude that the proliferation of independent information systems was both "wasteful and redundant," and did not solve "the basic need for compatible and comparable management information at a number of decision-making levels." If information systems continued to develop in a helter-skelter manner, arts agencies would be investing considerable money and time without reaping the benefits of nationally compatible information. As time passed and the pace of development accelerated, it would become economically and administratively impossible for agencies to undo what had been done, and the vision of effective national arts information exchange would never be realized.*

The National Information Systems Project was initiated with the express purpose of establishing a national standard for information systems in public arts agencies. While not as glamorous as developing a new program to aid symphony orchestras or individual craftspeople, the NISP effort would ultimately benefit these arts constituents by improving the management and advocacy capabilities of the agencies established to serve them. NISP's mandate was to develop working definitions for the data which arts agencies use and exchange, and to provide standards for the basic information systems they need. Thus the project would accomplish part of the systems design work so sorely needed for better information management within arts agencies, while simultaneously leading them toward compatibility of their information.

*John K. Urice, *Consultant's Report re Information Management Systems for State and Regional Arts Agencies* (1978), page 5.

To help accomplish this, NISP developed the National Standard for Arts Information Exchange (pp.105-167) to serve as a rule for basic information systems in public arts agencies. The National Standard consists of systems composed of terms, definitions, and reporting requirements established to guarantee national compatibility in the collection, organization, and exchange of arts information. This Standard represents the cooperative work of many agencies in establishing a vocabulary for information systems, and when it is implemented by them, will provide a basis for meaningful analysis and use of data about public arts activities in America.

In the remainder of this chapter, we will look closely at each system comprising the National Standard for Arts Information Exchange, the components of each system, and plans for their future use and maintenance.

The Systems

The National Standard consists of information systems for:

1. Mailing Lists;
2. Grants Management;
3. Eight Arts Resource Directories:
   - Exhibitions, Shows, and Festivals
   - Performing Arts Facilities
   - Visual Arts Facilities
   - Individuals in the Performing and Literary Arts
   - Individuals in the Visual and Media Arts
   - Performing Arts Organizations
   - Visual Arts Organizations
   - Sponsors / Presentors.

These three systems were included in the National Standard for several reasons. First, one or more of them was common to every participating agency, and therefore provided occasion for management improvement in many places. Second, they offered the greatest opportunity for national standardization. For example, unlike fiscal systems, which varied greatly and were usually provided by government accounting divisions, these systems were developed and controlled by arts agencies themselves, and were already somewhat similar. Finally, they provided the kinds of information needed for national information exchange. A national standard for mailing would provide a comprehensive profile of American arts agency constituents and would allow agencies to share their lists with each other. Standard grants management systems would make possible the collection and analysis of data on the disbursement of public funds. And standard arts resource directories would be used to facilitate the awareness, use, and exchange of the nation's cultural assets.

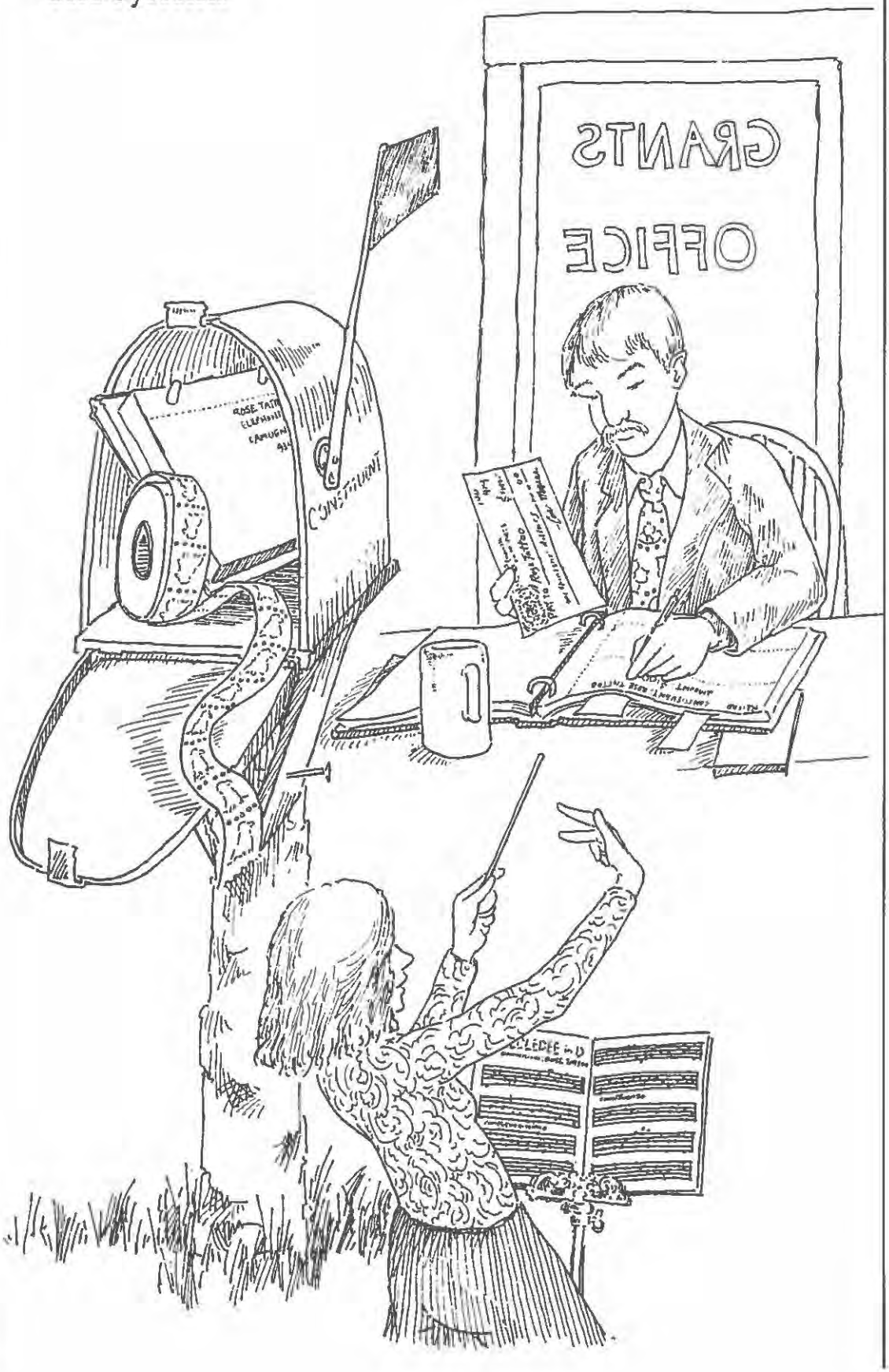
The three systems are differentiated by their unique functions within an arts agency. A mailing list system has a simple purpose: to get the right mail to the right people. Grants management systems are used to keep track of which constituents have requested funds, where their requests stand in the agency's review process, and how many grants were awarded within certain years, programs, budget categories, political districts, and so forth. Arts resource directory systems catalogue and classify an area's resources (such as artists, organizations, facilities, and the like) and organize pertinent data in a manner useful to both agency staff members and constituents.

At the same time, the three systems are clearly related. For example, while not everyone on an agency's mailing list has received a grant, those who have will also be listed on the documents and in the logbooks comprising the grants management system. Likewise, most grantees under a performing arts touring program will also appear in a directory of sponsors. And a gallery appearing in a visual arts facility directory may be on the mailing list for program guidelines and a recipient of funds as well. So before we elaborate upon each separate information system, we will consider the way in which the National Standard links the three systems by a common root or core called the Constituent List.

Constituent List

The Constituent List contains names and addresses of all organizations and people with whom an arts agency does business and wishes to remain in contact, all those from whom it receives support and to whom it is accountable. Each entry in the Constituent List represents an applicant, grantee, correspondent, payee, vendor, mail recipient, donor, or other constituent with whom the agency interacts. Each entry, that is each name and address unit for an individual or organization, is the core of all information about a constituent in one or more of the National Standard systems. The Constituent List is both the foundation upon which the three systems are based and the link among them.

In each of the National Standard systems, other information is added to this basic name and address unit. The name and address of "Riverside Art Gallery," for example, forms an information core about one of an agency's constituents. The Mailing List System takes this information core and adds codes which describe "Riverside Art Gallery" as a nonprofit art gallery and direct certain kinds of mail to it (such as traveling exhibition program guidelines). In the Grants Management System, the same constituent, "Riverside Art Gallery," may also form an information core. There, information about a


GRANTS
OFFICE

request for funds to develop a traveling exhibition (e.g., name of the exhibition, grant amount requested, total cost of the project, curator's name) would be added to the name and address unit. Finally, in a resource directory of visual arts facilities, "Riverside Art Gallery" would again appear as a constituent. The Constituent List name and address would be augmented with a contact person, telephone number, dimensions of temporary exhibition wall and floor space, type of lighting, and so forth. A constituent may be thus found in one, two, or all three of the systems, and it may exist more than once in a single system, as it would in the Grants Management System if it applied for more than one grant. The key is that every National Standard system entry includes a constituent as its core.

In reality, particularly in non-computerized information systems, it is unlikely that all constituents' names and addresses would be stored together in one place. Instead, the names and addresses of individuals and organizations would be placed in the information system in which they are used. For example, a constituent who received a grant would be listed in the grants management system; one with a theatre for rent would be part of a performing arts facility directory; and one who likes ballet would be on a mailing list for a dance newsletter. But it is at least conceptually helpful to think of a pool of arts agency constituents, each further described or defined by additional pieces of data, and each serving as a core of one or more of the National Standard systems.

In computerized information systems, on the other hand, it might indeed be appropriate to keep all constituents in one place. Doing so would make it possible to store each constituent's name and address only once in the computer while simultaneously cross-referencing them to mailing list, grants management, accounting, and directory systems. When the agency wished to change a particular name or address, it would need to make the change in the computer's Constituent List only once, yet the new information would appear in all systems containing data about that constituent.

The Constituent List core, whether actual or conceptual, can have one additional function. As the nucleus around which arts agencies build information systems, it can serve as the starting place for system planning in agencies with the needs and resources to go beyond the National Standard systems. The constituent "Riverside Art Gallery," for example, could form the core of a fiscal accounting system entry when check date, number, amount, and account codes are added to the basic name and address. Or it could link into an events calendar system listing exhibition titles, performing groups, dates, times, locations, and ticket prices. In this way, an extensive collection of information about "Riverside Art Gallery" could be brought together when necessary.

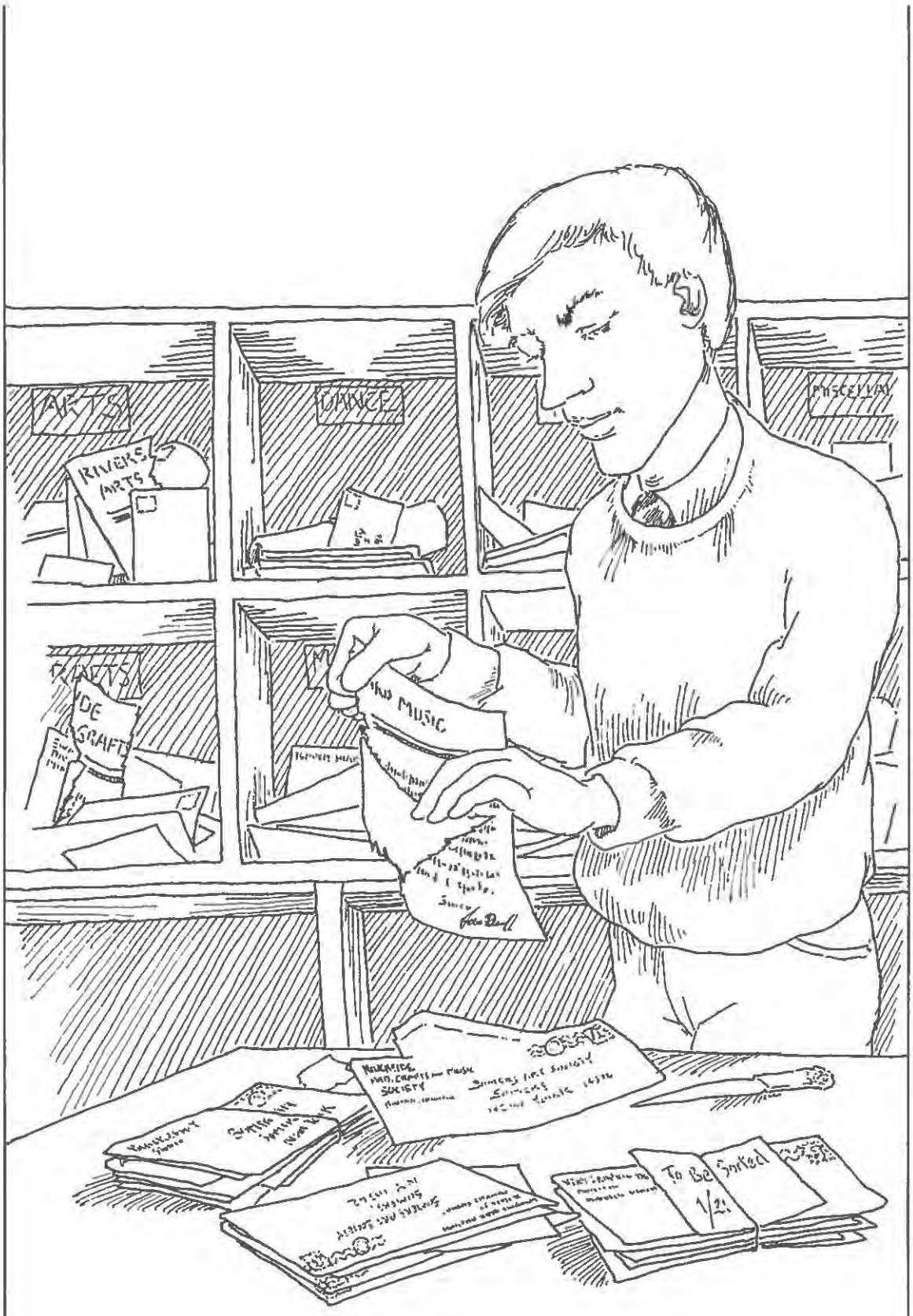
Mailing List System

Public arts agencies use mailing list systems to direct various types of information to the appropriate constituents. To accomplish this, the names, addresses, cities, states, and ZIP Codes of constituents with whom an agency has had or desires to have contact are listed on sheets of paper, cards, or photocopy label masters; punched onto metal plates; or typed into computer terminals. This alone, however, will not insure an agency's ability to direct its mail to the constituents for whom it is intended.

In a good mailing system, entries must be identified in such a way that an agency is able to select particular groups of constituents to receive specific kinds of mail. Consequently, mailing list names and addresses must be assigned a code designed to classify them for mailing purposes. The combination of a Constituent List entry and a mailing code is the basis of the National Standard Mailing List System.

Mailing systems typically assign each entry a numeric or alphabetical code which places it in a category with similar entries. Similarities may be based on location, subscription type, interest, organization type, or one of innumerable other common attributes which suit the mailer's needs. When preparing a mailing, the mailer chooses the codes for the groups to receive mail and prepares the labels or envelopes needed. For example, consider a public library which has a mailing list of card holders grouped by age: children, high school students, college students, adults, and senior citizens. The names and addresses are stored on data cards, each of which is punched according to a numeric code (e.g., 1 = children, 2 = high school students, etc.), and filed alphabetically. To advertise a series of children's films, the librarian plans to mail a brochure to the children and adults on his list. He will choose all cards with either a "1" or a "4" punched out, and type a mailing label for each card holder selected.

Conventional mailing list codes, like the one above, classify entries by only *one* similarity. But the unusual diversity and specialization involved in serving an arts constituency make similarities hard to apply on an even-handed basis. For example, an orchestra and a potter are similar in that they produce art, and an orchestra and a community concert series are similar because they are both music organizations. All three should not be given the same code, however, because the potter and concert series do not have similarities useful in a mailing system.



Mailing List System

Some arts agencies have responded to the problem of serving a diverse constituency by adding detail to a conventional mailing code. A potter is grouped with potters, an orchestra with orchestras, and a community concert series with other such series. Then, to distinguish differences, college orchestras are separated from professional ones, and those playing contemporary music from those with symphonic repertoires. Nonprofit community concert series are coded differently from commercial ventures, and those which present chamber music are distinguished from those sponsoring jazz. Each constituent is carefully defined according to the type of individual or organization it is.

This degree of detail, however, decreases the system's ability to group constituents according to more general similarities (e.g., those which produce art, those involved with music). Consequently, each time a mailing is planned, the mailer must go through a long list of individual and organization type codes, choosing one by one those which are appropriate for the mail being sent. It is evident that there should be a way to relieve the user of the chore of making such distinctions every time a mailing is required. A more valuable system would combine groups when they have common attributes while keeping their differences distinguishable. *And* it would insure that constituents receive mail appropriate to their work and interests. After all, the primary objective of a mailing system is to match mail with the people who want or need it.

"TARGET" Code

The National Standard Mailing List System uses a code which classifies each constituent according to four attributes: STATUS, FUNCTION, INSTITUTION, and DISCIPLINE (see illustration on p.50). The combination of these attributes, called the "TARGET" code, describes each mailing list entry as a highly-detailed conventional code would, with the difference that the attributes place the constituent in numerous groups which the user can select without choosing types of individuals or organizations one by one. STATUS, for example, will distinguish profit from nonprofit community concert series. It also will group each with all other profit or nonprofit organizations on the mailing list. The attribute defining FUNCTION in the arts community differentiates an orchestra (which produces art) from the concert series (which sponsors arts events). But it classifies the orchestra with theatres and dance companies which also produce art, and the concert series with schools, libraries, festivals, and all others who present performances. INSTITUTION distinguishes college and professional orchestras, but combines each with others of its type. And DISCIPLINE separates the orchestra and the potter (which are involved in music and crafts, respectively), while grouping the orchestra and community concert series (which are both involved in music).

Let us look for a moment at how an orchestra would be described according to the National Standard "TARGET" code, using *one* category from each of the four attribute columns:

STATUS:	02 (Organization - Nonprofit)
FUNCTION:	01 (Artist / Producer)
INSTITUTION:	03 (Performing Group)
DISCIPLINE:	02 (Music)

Such coding places the orchestra in groups of other nonprofit organizations, professional producers, performers, and musicians. Mail "targeted" for any one of these groups will reach the orchestra. Likewise, mail "targeted" to combinations of groups — all nonprofit performing groups, all music producers — will also go to the orchestra. Thus by identifying single groups (e.g., nonprofit organizations) or combinations of groups (e.g., nonprofit music performing groups), the National Standard "TARGET" code allows both generality and specificity in directing information to arts constituents. In either case, those who want or need the mail will receive it.

"CONTENT" Code

Many times arts agencies have mailings which need to be sent to constituents for whom no common "TARGET" code exists. The subscribers to a newsletter, for example, will include potters, but not all of them, and may include symphony orchestras, but not every one. Therefore, a "CONTENT" code has been designed to designate certain mailing list entries for specific kinds of mail. Whereas the "TARGET" code describes *who* a constituent is, the "CONTENT" code specifies *what kind of mail* he should receive. Unlike the "TARGET" code categories, which are mutually exclusive (i.e., only *one* category from each attribute can be assigned to an entry), the "CONTENT" code categories are all available (i.e., the user or constituent can pick any or all of the "kinds of mail" indicated). So, for example, an arts agency can decide that the orchestra illustrated above should receive information about music, as one would expect, but also about arts management, the agency's programs, and its newsletter. The National Standard lists nineteen "CONTENT" categories, most of which follow arts discipline lines. It recommends that an agency provide space for an additional thirteen "CONTENT" categories (five are shown in the illustration on p.50) for such internal uses as subscription newsletters, program information, and other kinds of mail which cross over "TARGET" code distinctions.

TARGET: Choose the *one* item in *each* column which best describes the constituent.

STATUS

01 Individual
02 Organization - Nonprofit
03 Organization - Profit
04 Government - Federal
05 Government - State
06 Government - Regional
07 Government - County
08 Government - Municipal
09 None of the above

FUNCTION

01 Artist / Producer
02 Sponsor or Presentor
03 Arts Service / Advocacy
04 Humanities Service / Advocacy
05 Education
06 Funding
07 Media
08 Interested in the Arts
09 None of the above

CONTENT: Choose *all* items which describe what kind of mail the constituent should receive.

01 Dance
02 Music
03 Opera
04 Theatre
05 Visual Arts
06 Architecture / Design
07 Crafts
08 Photography
09 Media Arts
10 Literature
11 Community Arts
12 Folk Arts
13 Humanities
14 Multi-disciplinary
15 Arts Advocacy / Service
16 Arts Management
17 Disabled / Handicapped
18 Ethnic / Minority
19 Senior Citizens

- - - - - - - - - - -

20 Newsletter**
21 Press Releases**
22 Program Information**
23 Board / Council Material**
24 Panel Material**
etc.

INSTITUTION

01 Individual - Artist
02 Individual - Non-artist
03 Performing Group
04 Performing Group - College / University
05 Performing Group - Community
06 Performing Group - Youth
07 Performance Facility
08 Museum - Art
09 Museum - Other
10 Gallery / Exhibition Space
11 Cinema
12 Small Press
13 Literary Magazine
14 Fair / Festival
15 Arts Center
16 Arts Council / Agency
17 Arts Service Organization
18 Union / Professional Association
19 School District
20 School - Parent-Teacher Association
21 School - Elementary
22 School - Middle
23 School - Secondary
24 School - Vocational / Technical
25 School - Other
26 College / University
27 Library
28 Historical Society / Commission
29 Humanities Council / Agency
30 Foundation
31 Corporation / Business
32 Community Service Organization
33 Correctional Institution
34 Health Care Facility
35 Religious Organization
36 Senior Citizens' Center
37 Parks and Recreation
38 Government - Executive
39 Government - Judicial
40 Government - Legislative (House)
41 Government - Legislative (Senate)
42 Media - Periodical
43 Media - Daily Newspaper
44 Media - Weekly Newspaper
45 Media - Radio
46 Media - Television
47 None of the above

DISCIPLINE

01 Dance
A ballet*
B ethnic / folk / jazz*
C modern*
02 Music
A band*
B chamber*
C choral*
D contemporary*
E ethnic / folk*
F jazz*
G popular*
H solo / recital*
I symphonic*
03 Opera
04 Theatre
A theatre - general*
B mime*
C musical theatre*
D puppet*
E theatre for young audiences*
05 Visual Arts
A conceptual art*
B graphics*
C inter-media*
D painting*
E performance art*
F sculpture*
06 Architecture / Design
07 Crafts
08 Photography
09 Media Arts
A film*
B radio*
C television*
D video*
10 Literature
11 Community Arts
12 Folk Arts
13 Humanities
14 Multi-disciplinary
15 Non-arts / Non-humanities

* Optional
** Example; actual items to be determined by each agency using the code.

Example

A hypothetical mailing list may best illustrate the use of the National Standard "TARGET" and "CONTENT" codes. Envision a mailing list which includes three entries — an orchestra, a potter, and a small town arts council concert series. A questionnaire with specific instructions and the codes can be sent to the entire mailing list. The three constituents will indicate *one* choice only under *each* of the four "TARGET" attributes, and will select as many "CONTENT" categories as are appropriate to their interests and activities. When they return their questionnaires, the results may look like this:

1. The orchestra:

STATUS	02	(Organization - Nonprofit)
FUNCTION	01	(Artist / Producer)
INSTITUTION	03	(Performing Group)
DISCIPLINE	02	(Music)
CONTENT	01, 02, 03, 04, 20	(Interested in Dance, Music, Opera, Theatre, and the Newsletter)

2. The potter:

STATUS	01	(Individual)
FUNCTION	01	(Artist / Producer)
INSTITUTION	01	(Individual - Artist)
DISCIPLINE	07	(Crafts)
CONTENT	20	(Interested in receiving the Newsletter)

3. The small town arts council concert series:

STATUS	02	(Organization - Nonprofit)
FUNCTION	02	(Sponsor or Presentor)
INSTITUTION	16	(Arts Council / Agency)
DISCIPLINE	02	(Music)
CONTENT	02, 14, 17, 21	(Interested in Music, Multi-disciplinary information, issues relating to disabled and handicapped persons, and press releases)

Four mailings are now "in the works": a quarterly newsletter, a government release about handicapped access regulations, a touring program information brochure, and a description of new laws concerning performance of copyrighted musical works.

The newsletter mailing is very conventional. Many agencies would maintain a separate list of all people who receive the newsletter. In the National Standard system, such constituents are identified under the "CONTENT" code. To obtain the newsletter list, the mailer will ask for all entries which have "CONTENT" category 20 (Newsletter) marked. Only the constituents intended to receive the newsletter will receive it, no matter what kinds of organizations or individuals they are. In the hypothetical mailing list above, both the orchestra and the potter will receive the newsletter.

Information about issues concerning disabled and handicapped persons will be sent to anyone who requested information under "CONTENT" 17 (Disabled / Handicapped). If the mailer wanted to assure that all performing arts facilities and arts centers also received the information, INSTITUTION 15 (Arts Center) and 07 (Performance Facility) would be added. In our example, the arts council concert series will receive this mailing. (Note that in a conventional system, they would likely have been skipped since not all arts councils necessarily require information of this type.)

The touring program information brochure is essentially for visual and performing arts sponsors. FUNCTION 02 (Sponsor or Presentor) selects them all, no matter what kind of INSTITUTION each sponsor is. The mailer will not have to go through the INSTITUTION list and pick the kinds of organizations that are likely to act as sponsors, because FUNCTION identifies the sponsors as a group, regardless of their INSTITUTION category. In the hypothetical mailing list described above, the arts council concert series will receive sponsor mail, even though many other "Arts Councils / Agencies" will not. Again, the mailing system matches the right mail with the right constituents.

Copyright information on music performances is needed most by music performing groups. The mailer of this information will ask for INSTITUTION 03 (Performing Group) and DISCIPLINE 02 (Music), to obtain all professional music performing groups. If individual performers and university, community, and youth music performing groups should also receive the copyright information, the mailer would add INSTITUTION 01, 04, 05, and 06. In the sample list above, the orchestra will be the only entry to receive copyright information.

Some comments are in order before we conclude our examination of the National Standard Mailing List System. First, the "TARGET" code is not intended to define every constituent with absolute specificity. Rather, the categories and their definitions (pp.114-117) are intended to group constituents according to similarities and to distinguish differences which are useful for mailing purposes. With the varied constituents served by arts agencies, there will be mailing list entries which do not seem to fit anywhere. They should be compared with organizations which have similar information needs and coded accordingly. The system will be useless if the people assigning or editing codes mark every questionable entry as "None of the above."

Second, the National Standard Mailing List System was designed to handle large amounts of information. Although its codes enable it to attain the specificity of mailing to all nonprofit senior citizens' opera clubs, the system should not be used routinely for small mailing lists of less than a few dozen names and addresses. These are best maintained just as many arts agencies maintain them now — on photocopy label masters. A combination of well-organized, up-to-date label masters for small mailings and a National Standard system for large mailings offers an agency the ability to match people and mail both efficiently and effectively.

Grants Management System

Public arts agencies use grants management systems to track the grant-making process from an application's arrival in the office until it has been duly entered in agency records and reported to appropriate funding sources. For purposes of the National Standard, an agency's grants management system includes information on all agency activities for which there is an application/award process and/or a request-for-services process, whether or not a grant is ultimately awarded. In addition to conventional grants given to individuals and organizations for specific projects, this definition encompasses contracted program services (e.g., fees paid to a dance company for lecture-demonstrations in a school); reimbursements for completed projects (e.g., paying for a consultant under a technical assistance program); programs awarded by an agency without the exchange of money (e.g., exhibitions or touring programs organized by the "grant"-giving agency), and information on all non-funded grant applications. It does not include day-to-day activities such as routine responses to requests for information or the informal "technical assistance" rendered by staff in performance of their jobs.

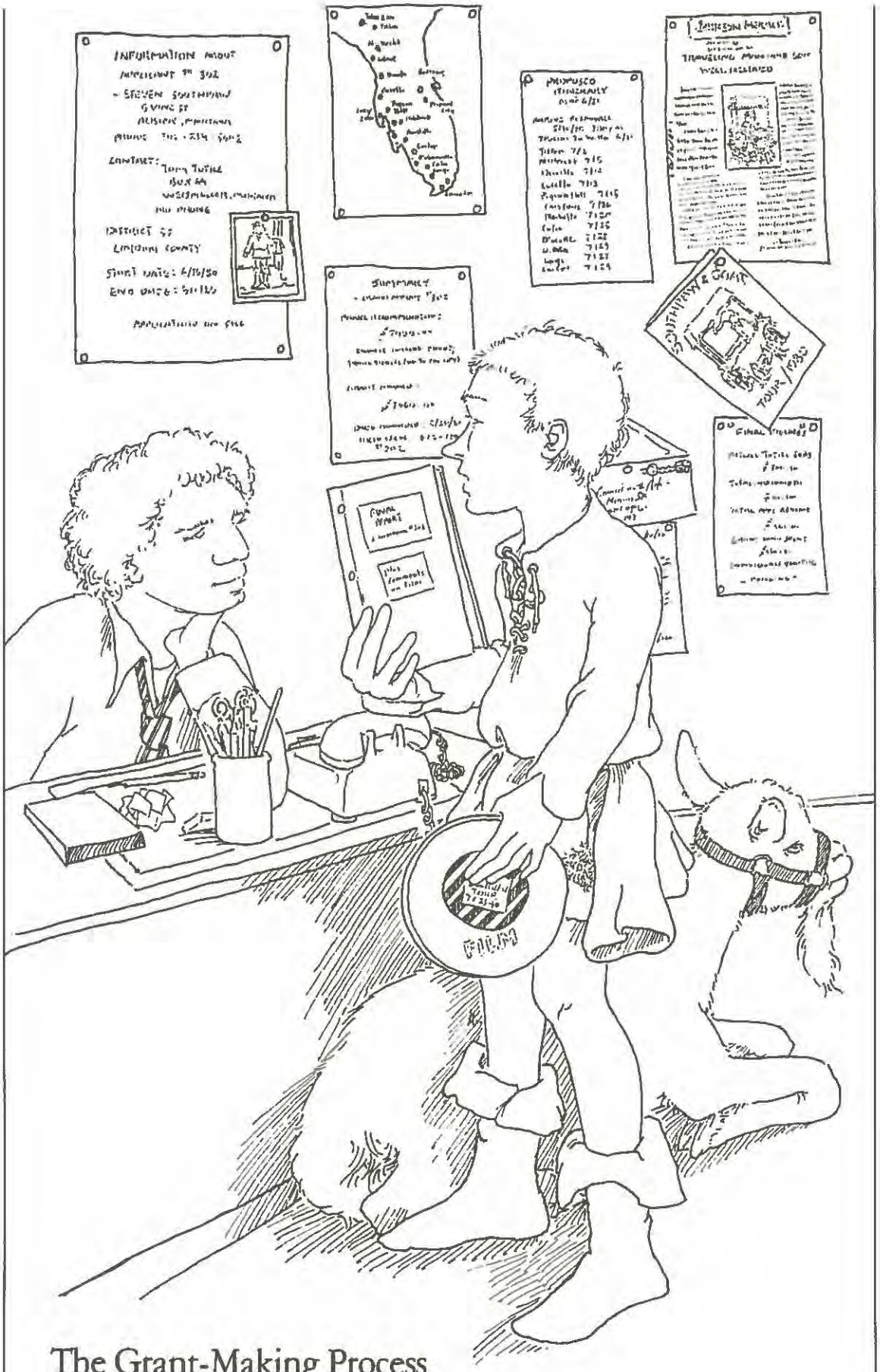
The core of the National Standard Grants Management System is a Constituent List entry (name and address) for the individual or organization requesting arts agency grant funds. In the Grants Management System, this core entry is called the "Applicant." To it, the system adds information about:

- the **Applicant** itself, such as basic documentary data, geographic location (county, legislative and congressional districts, etc.), and a budget profile;
- the **Process** used to track applications from receipt to final report, including dates and codes relating to review and funding procedures, an application's status in that procedure, the grant program, and the amount awarded;
- the **Project** for which assistance is being requested, including data on arts discipline and type of activity involved, the time period, project budget information, and amount requested;
- the final **Report** filed by the grantee to document how funds were spent and matched and how many people benefited from project activities.

The National Standard Grants Management System is designed to enable arts agencies to provide specific information about each grant application and award, plus aggregate statistics for reporting to staff, panels, boards, and funding sources on how grant program resources were distributed. Data on applications received and grants awarded, organized by the system's categories (e.g., program, discipline, grant amount, budget, etc.), are also useful for program planning and evaluation.

Arts Resource Directory Systems

Public arts agencies use arts resource directory information systems to organize and classify resource data in a manner which will make them useful to agency staff members, constituents, and the general public. An arts resource directory is any list, catalogue, or file of information about cultural assets, whether they be people, organizations, businesses, buildings, books, films, or events. Resource directories can be typed lists, pamphlets, books, index cards, or computer printouts custom-designed to a user's specifications. The important thing is that they be readily available and easily consulted for assistance in finding a fact, a publication, an artist, a theatre manager, or any of innumerable pieces of information about the nation's wealth of cultural resources.



Common arts resource directories are facility inventories, artist and arts organization registries, and sponsors of performing arts activities. The eight directories listed on page 45 as the National Standard Arts Resource Directory Systems, include these characteristic types. In every case, a Constituent List name and address — of a performance or exhibition space, person, organization, sponsor, or show — is augmented by information unique to that constituent. For example, in the system for a performing arts facility directory, the facility's name and address form a core to which are added data on contact people, telephone numbers, seating capacity, stage dimensions, lighting and sound systems, dressing rooms, and so forth.

As an illustration, let us consider how such a resource directory system would be used. Imagine an arts agency which has collected data on all of the performing arts facilities within a region. The information is stored in a computer which has the capacity to sort it in a variety of ways and to print it on paper or gummed address labels. Now imagine an opera company planning a tour of that region. The company's booking agent would like mailing labels for the major performing arts facilities in the region, and a list of contact people and telephone numbers so she can do follow-up calls to each site after mailing the company's publicity packet. But she is interested only in those facilities with adequate stage dimensions for the company's sets, an orchestra pit, lighting and sound systems, and a backstage loading dock at stage level. Equipped with a list of facilities meeting these minimum requirements, she will be able to contact someone in each location to discuss the possibility of booking the opera into the facility. In response to the booking agent's request, the arts agency's computer operator will be able to type the specifications into the computer and present her with the reference material she needs.

The System Components

As we begin to examine the components of the information systems contained in this book, it is crucial that we understand what the National Standard for Arts Information Exchange does *not* include. And a helpful way to do this is to recall one way in which we defined "system" in Chapter I, namely, as the specifications for organizing, defining, and reporting information.

The National Standard systems are information systems in this sense of the word. They include terms, definitions, and reporting requirements designed to insure compatibility of the information exchanged among public arts agencies. They do not, however, dictate which people should be part of an agency's information systems, or what type and model of computer should be used to store and process the data. In fact, they do not specify whether a computer or any other equipment is even needed or desirable. The systems are not accompanied by computer programs detailing how standard data should be manipulated; nor do they provide a procedures manual telling arts agency staff members how to file grant applications, for instance, or when to send report overdue notices. The systems do not supply guidelines concerning the use of information, access to it, or methods for safeguarding it. In short, the National Standard does not standardize the people, equipment, and procedures aspects of arts agency information management.

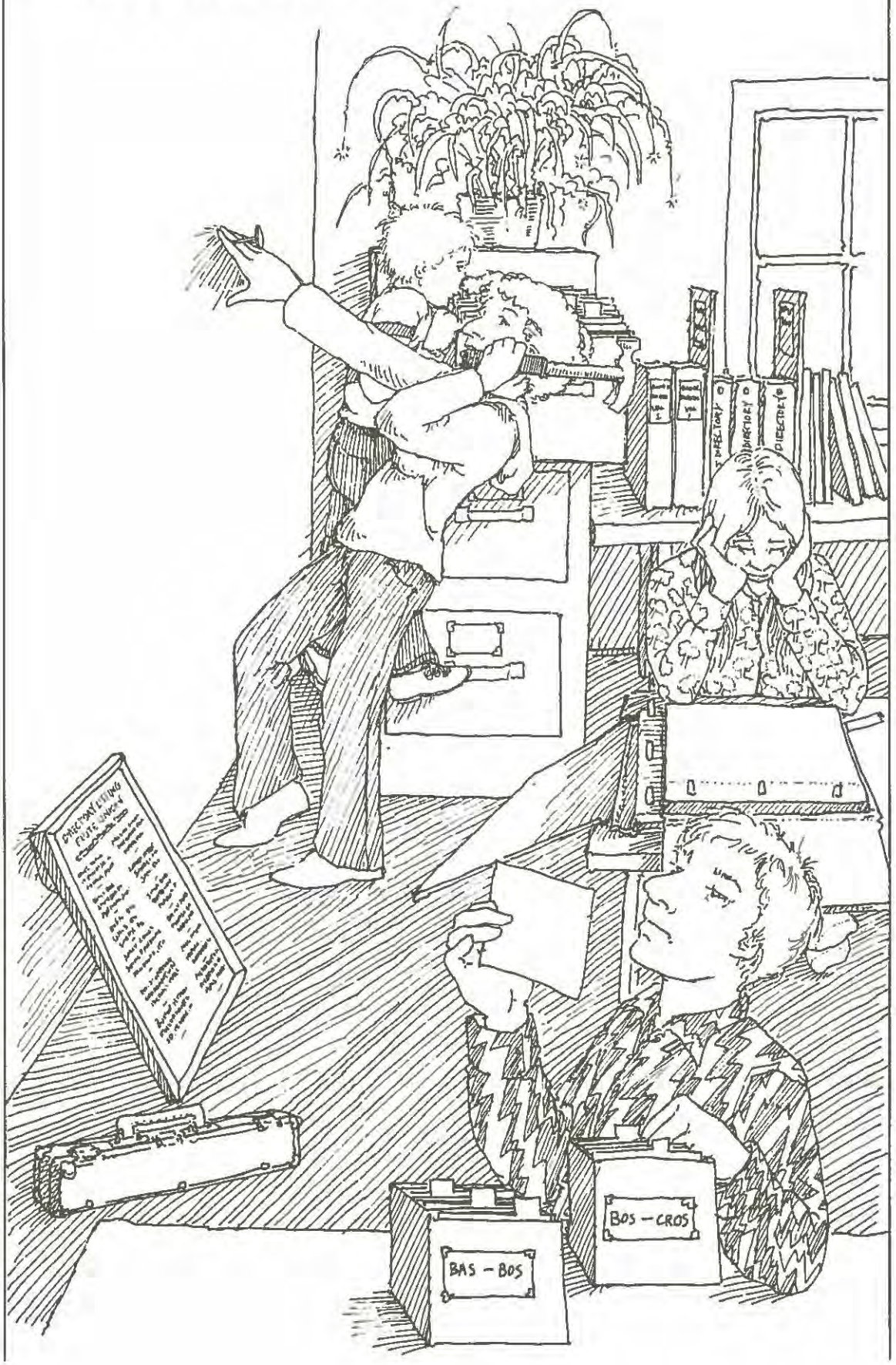
Furthermore, the National Standard does not mandate methods for collecting data from constituents or policies for using information to accomplish an arts agency's objectives. Some public arts agencies, for example, have successfully implemented the Mailing List System by sending out questionnaires which asked constituents to code themselves. But these questionnaires were not merely copies of the code exactly as it is printed in this book. The best questionnaires included clear, simple instructions, clever layout, and design reflecting the agency's image and intent. Each returned questionnaire was proofread by staff to catch errors or misunderstandings, and follow-up mailings were sent to constituents who did not respond the first time. Legislators and media contacts were coded regardless of whether they returned questionnaires, and obsolete entries were deleted from the system. In the end, questionnaire design, careful editing, and follow-up were as crucial to the development of an effective mailing system as the National Standard codes or the agencies' computers.

To summarize then, the National Standard identifies the information public arts agencies should be able to provide and the format in which it should be provided. The policies and procedures governing how that information is obtained are up to each individual agency.

The three systems of the National Standard for Arts Information Exchange include these components:

- **Fields** — spaces for items of information (together with definitions or codes which identify and describe each field);
- **Selections** — specifications for how a system should be able to process information;
- **Reports** — formats for how the results should be shown.

Arts Resource Directories



Fields

A field is a space allocated for an item of information in an information system. On a form, such as an income tax return, a field is the blank where a certain answer is intended to be written. For every entry in the system (i.e., every tax return filed), there is a group of fields which, taken together, constitute a single tax return form. Each field on the form has a name or label to identify the information normally contained in it. "Last Name," "Social Security Number," "Spouse's Social Security Number," "Adjusted Gross Income," and "Refund Due" are typical field names on a tax return. Each field is defined so that everyone filling out the form will understand the field names in the same way. Tax forms usually include an entire booklet of field definitions, each written to prevent misunderstanding and error. Nearly every field is filled in by most taxpayers, but some can be left blank. A single person, for example, would skip "Spouse's Social Security Number," and only someone who had overpaid his taxes would enter an amount beside "Refund Due." On the other hand, certain fields must *always* be filled in. Such fields are *required* fields and usually are those without which the entire entry is meaningless or useless. On a tax return, "Social Security Number" and "Adjusted Gross Income" are required fields. Sometimes fields are limited to a specific number of characters. When this is the case, the system will not accept letters or numbers which exceed that limit. On a tax return form, for example, "Social Security Number" is limited to nine characters.

The National Standard specifies field labels and definitions for the Constituent List and for every system. "City," for example, is a Constituent List field defined as

> "Post office address. For foreign mail include state/province abbreviation and country."

Hence according to this definition, "Chicago" and "Toronto ON Canada" would be valid pieces of information in the "City" field. In a mailing system, space for "City" may be allocated on a constituent questionnaire, and on the label master, metal plate, or computer diskette to which the information is transferred for storage. In a grants management system, data spaces are usually allocated on application forms and on index cards, logbooks, or in computers. The important thing to remember is that when a field is assigned to an information system, it must be allocated for *every* entry in the system, even if it is not always filled in (e.g., the field "Nonprofit Status" should be available for every constituent listed in a directory of sponsors), and it must be labeled and defined according to the National Standard.

The National Standard does not specify required fields, namely, those which must always be filled in. With some obvious exceptions (e.g., "Applicant," without which a grants system entry is meaningless; "ZIP Code," without which a mailing list entry is useless), required fields will vary among system users, so the choice to make a field required is left to each individual agency. Nor does the National Standard mandate field sizes, although for the sake of practicality, it does include suggestions. So while it is not crucial for national data exchange that the field "Name (organization or individual)" be thirty characters long, an agency which wishes to use standard 3 3/16" x 7/8" labels should not exceed that number for any field or group of fields which must fit on a single line of an address label.

Most fields in the Standard are designated as either "Numeric" (i.e., all numbers) or "Text" (i.e., letters, numbers, and other symbols), although the user can sometimes choose between the two. These terms refer to the type of characters required of the system when fields appear in printed form. Two additional terms, "Date" and "Constituent" also appear under the heading "Type Required" in the National Standard systems. "Date" refers to a regular configuration of six numbers (11/28/81), and "Constituent" is a group of Constituent List fields ("Name - organization or individual," "Address 1," "Address 2," "City," "State," "ZIP Code") with their accompanying type requirements.

Codes

Sometimes the National Standard stipulates that a field be filled in with a code, namely a letter, number, or symbol which represents some piece of information. While countless different names can be included in a "Name" field, and an endless variety of dollar amounts could be entered under "Grant Amount Requested," a code limits the user's choice to one of several very specific options.

For example, if a group of panelists were asked to rate a dance performance, they might respond: "exciting," "colorful," "very good," "boring," "repetitious," "unusual," "okay," and so forth. But if the person asking the question wished to reduce the range of possible responses and categorize them for easy comparison, she might ask the panelists to use the numbers 1, 2, 3, 4, and 5 to designate "very good," "good," "fair," "poor," and "very poor." Each code number would represent one answer and would organize information which would otherwise be too general or varied to use.

The National Standard uses many codes to represent specific information, including the "Discipline" code, which appears in all three systems, and the "Characteristics" code, which is found in the Grants Management and Arts Resource Directory systems. There are also codes classifying types of spaces, stages, floors, fly systems, light boards, pianos, security systems, and artists in the various directories.

Unless otherwise stated in the field definitions, National Standard codes are firmly established to insure compatibility, and may not be modified at all. If an agency were to add or remove portions of the codes, the information collected would mean something different. For example, if "48 (School - Primary)" were added to the INSTITUTION column of the Mailing List System's "TARGET" code, the existing category "21 (School - Elementary)" would have a changed meaning; it would no longer include grades one through three. The agency using the altered code would not have information compatible with the National Standard.

The National Standard code that is used throughout the Grants Management and Arts Resource Directory Systems to describe "Characteristics" of individuals and audiences *may* be expanded to meet agency needs as long as additional categories do not replace or redefine National Standard categories. For example, a letter or number designating a French American audience could be added as long as the same audience was also coded as "W (White -- not Hispanic)."

Another, the "CONTENT" code of the Mailing List System, *should* be expanded to meet special agency needs. As we have already seen, the first nineteen categories are established by the National Standard, but subsequent categories can be added to reflect each agency's unique mailing activities. If, for example, an agency offers a subscription newsletter about literature and literary criticism, it would be appropriate to assign a "CONTENT" category to that type of mail. This will insure that those who have paid to receive the newsletter can be identified easily for selective mailings.

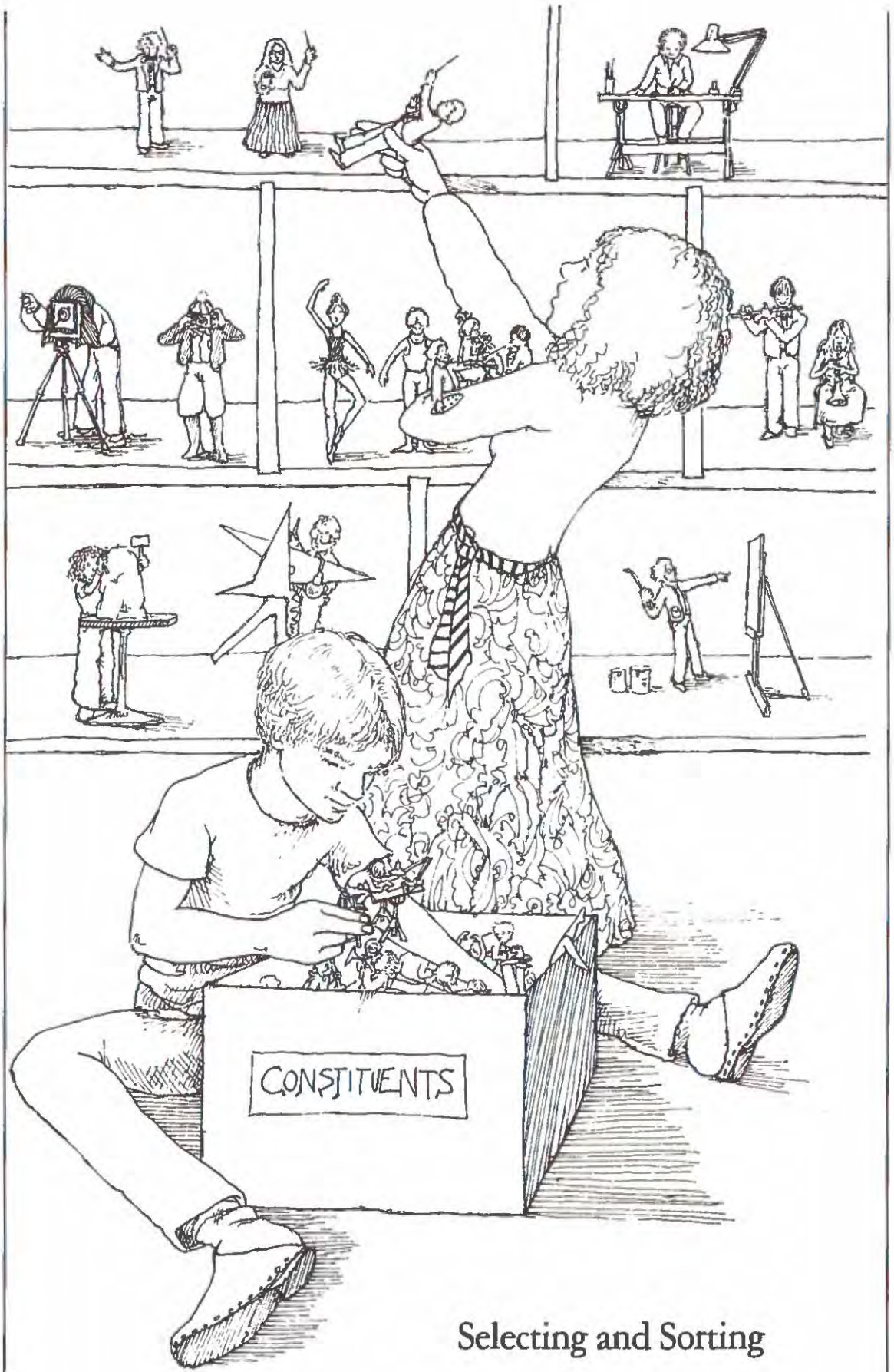
In several instances where a code is to be used, the National Standard does not specify the code's categories at all; instead, each agency using the system is required to design its own code. Examples are the "Program" and "Status" codes in the Grants Management System, which refer to the unique grant programs and processing procedures of individual arts agencies. In these cases, a nationally compatible code is neither possible nor desirable.

Finally, there are situations in the National Standard systems where codes are not mandated but would be useful. For example, an agency collecting data according to Massachusetts' sub-state regions could allocate up to fourteen field characters for each entry in its grants management system to record WESTERN, CENTRAL, NORTHEAST, GREATER BOSTON, or SOUTHEAST. Or it could use a code ("1, 2, 3, 4, 5" or "W, C, N, G, S") to represent the desired information. Grants Management System fields for recording counties and legislative districts could be coded in a similar manner.

Selections

Selection is the method used to choose a specific portion of the data stored in an information system for printing in a report or displaying on a terminal. It is the process at work when a person picks certain folders from a file drawer or when a computer chooses specific entries from an electronic data base according to predetermined criteria.

Suppose, for example, that an agency wants to mail only to Kansas City addresses. In its mailing list system, the file or data base is the entire collection of all names, addresses, and codes. For a mailing of only Kansas City addresses, the selection criteria is that the "City" field must be "Kansas City." The process of picking only Kansas City addresses and passing over all others is called selection. When this is done, the result is no longer "just a mailing list"; it has become "a Kansas City mailing list."



Selecting and Sorting

Selection is one of the greatest powers of a computer, since the speed and accuracy with which a computer can perform this process allow users to print selectively almost immediately upon request. More importantly, selection by a computer allows users to take a large mass of information which would otherwise be difficult to comprehend, and break it into smaller, understandable parts.

The power to select is just as essential in a manual or mechanical system where the speed and accuracy of a computer are not available. For example, in a manual grants management system, it is sometimes important to be able to pull from a file drawer of all grant applications only those for dance projects — or those from the third Congressional District, or from the Southwest Arts Council, or with Hispanic artists participating — even if this takes a long time.

Many information systems, particularly those involving computers, include the capability to *sort* data, that is, to put entries in a specific order (e.g., alphabetically by surname or in descending order by grant amount). It is important to keep the processes of "selecting" and "sorting" distinct. Selecting is *picking out entries* according to certain criteria. To select by the ZIP Code "02138," one would pull from a system all entries that have this particular ZIP Code. Sorting is *putting entries into a new order* according to certain criteria. To sort by ZIP Code, one would put each entry in ZIP Code numeric order, beginning with the "00000's" and ending with the "99999's."

The National Standard includes selections for the Mailing List and Grants Management Systems. They are expressed in sentences (e.g., "Get any applications from the Sarasota Senior Citizens Guild") to illustrate the types of criteria to be used in the selection process. It is recognized, of course, that there are a variety of ways in which such selection requests could be made to a computer system (e.g., APP = SARASOTA SENIOR). The National Standard does not specify the language of selection statements or the order in which data must be sorted. It simply illustrates what arts agency information systems should be able to provide.

Reports

Reports are the documents generated by an information system. They are the organized information typed or written by hand in a manual system, or the hard copy output of a computer system. Each report is composed of fields of information selected from the system's storage medium — whether that be an index file, a drawer, a pile of applications, or a computer disk — and presented in a prescribed format which includes elements such as titles, headings, results of calculations, totals, and space.

Because reports are the primary form of information exchange among public arts agencies, they are included as components of the Mailing List and Grants Management Systems.

Necessary and Optional

Each field, selection, and report component of the National Standard systems is designated as either "Necessary" or "Optional."

- Necessary *components are those which every public arts agency with applicable information systems should be able to provide.*
- Optional *components are those which should be consistent among the agencies which choose to include them in their systems.*
- Unique needs of individual arts agencies are not included in the National Standard, but *when such needs require additional fields, selections, and reports, they should not replace or redefine those contained in the National Standard.*

Necessary fields, selections, and reports represent the minimum essential information in a National Standard system. Necessary system components are *needed*

- in an agency, for effective use of an information system, and/or
- on a national basis, as part of a pool of data about public arts activities in America.

Necessary fields include the Mailing List System "Mail Code," and Grants Management System "Congressional District of Applicant," "Discipline," and "Grant Amount Requested." Necessary selections specify that public arts agencies be able to select all nonprofit arts centers from a mailing list, for example, or all grant applicants seeking funding for theatre projects from a grants management system. Necessary reports show how the selected information should be presented. Mailing labels are a Necessary report in the Mailing List System, and every grants system should be able to provide a table showing specific budget information for each application. Necessary selections and reports use only Necessary fields; the National Standard does not list as Necessary any processes or report formats based on non-Necessary data.

Optional system components could be *useful*

- in an effective information system and/or
- in a national analysis of arts data;

however, they are not needed on a national basis. If included in an agency's information systems, Optional components should be defined and maintained according to the National Standard to insure compatibility among those choosing to use them. Optional fields include "Contact Person" in the Mailing List System, most project budget fields in the Grants Management System, and all fields in the Arts Resource Directory Systems. The ability to select grant applications by "Date Report Due" is Optional, because while it should be consistently understood when used, it is not essential to a grants system or needed on a national basis. A report listing all Mailing List System names and addresses horizontally on pages of paper would be useful as an edit to confirm the accuracy of data entered into a computer system. But since such a report is not needed on a national basis and would not be the primary form of mailing list exchange, it is an Optional report.

The National Standard does not include fields, selections, or reports which

- are useful only in unusual situations (e.g., "Local Development Region Number," a report of grant projects involving more than twenty volunteers);
- need not be maintained in the same manner by all agencies choosing to use them (e.g., "State Tax Identifying Number," a summary report of grant applications to be reviewed by a music panel);
- relate to data collected for documentary purposes only and therefore are not exchangeable information (e.g., checklists indicating receipt of financial statements, résumés, and other supporting documents; selection by all applicants who forgot to enclose a copy of their tax-exempt status letter).

Arts agencies may, of course, include such components in their information systems, and are encouraged by the National Standard to do so in certain instances. However, additional fields, selections, and reports must not replace or redefine either Necessary or Optional components. For example, an agency with grant review panels organized along arts discipline lines may have a field labeled "Panel" and may code each application according to which panel will consider it. This field must not, however, be used in place of the National Standard "Discipline" code, even if all categories are identical, since this would be *replacing a Necessary field*. Nor may an agency decide to delete "construction" from the Grants Management System "Type of Activity" code 07, which reads "facility design, construction, maintenance." This would be *redefining an Optional field*. So while individual arts agencies' unique needs can be addressed in their information systems, this should not be done at the expense of the standard vocabulary established by and for them all.

Compliance

Through its systems and their Necessary and Optional components, the National Standard provides a mechanism for leading public arts agencies toward compatibility of the information they use, compare, and exchange. It may be useful in this context to detail how this compatibility can be achieved and how the designers of the Standard built an implementation schedule into their plans.

It was the intent of the National Information Systems Project that all project participants — namely, the National Endowment for the Arts, fifty-six state and jurisdictional arts councils, and eight multi-state arts organizations — would achieve compliance with the National Standard for Arts Information Exchange by September 30, 1982. It was further anticipated that by the fall of 1983 they would begin to report on federally funded monies according to the National Standard, and that by September, 1985, all agencies would have at least three years of National Standard grants information available. From that point, public arts agencies would be expected to retain a minimum of three years of historical grant program data at all times.

To be in compliance with the National Standard, an arts agency's mailing list, grants management, and arts resource directory information systems would have to meet the following criteria:

1. provide all Necessary fields, selections, and reports according to National Standard specifications;
2. use National Standard specifications for any Optional fields, selections, and reports which the agency chooses to use;
3. comply with the rule that any additional fields, selections, and reports provided by the system not replace or redefine National Standard Necessary or Optional components.

Many arts agencies began the process of planning and developing National Standard information systems in late 1979 and early 1980, when NISP block grants first became available for this purpose and system specifications were released. In December, 1980, the Board of Directors of the National Assembly of State Arts Agencies (NASAA) recommended that its membership continue system implementation to achieve National Standard compliance by the fall of 1982. Meanwhile, the National Endowment for the Arts' Office for Partnership was finishing its plans to use revised final report requirements to collect National Standard data from state arts councils for their Fiscal Year 1983 federally funded grant programs. Thus it was imperative that efforts to plan and develop nationally compatible information systems continue. Otherwise arts agencies would find themselves in the difficult position of revising their record-keeping procedures at the time new reporting requirements went into effect, or of being omitted from research projects because no data were available.

Changing the National Standard

Through implementation and use of the Standard systems, and with changing emphases and needs in the American arts community, portions of the National Standard may need to be amended from time to time. Changes to the systems need not be extensive, but flexibility is essential if the systems are to be effective. For example, some day it may be advisable to make some of the Optional Grants Management System fields, selections, or reports Necessary on a national basis, to revise certain field definitions, or to reorganize and redefine some code categories.

A procedure for changing the National Standard for Arts Information Exchange has been developed and approved by the NASAA Board of Directors as follows:

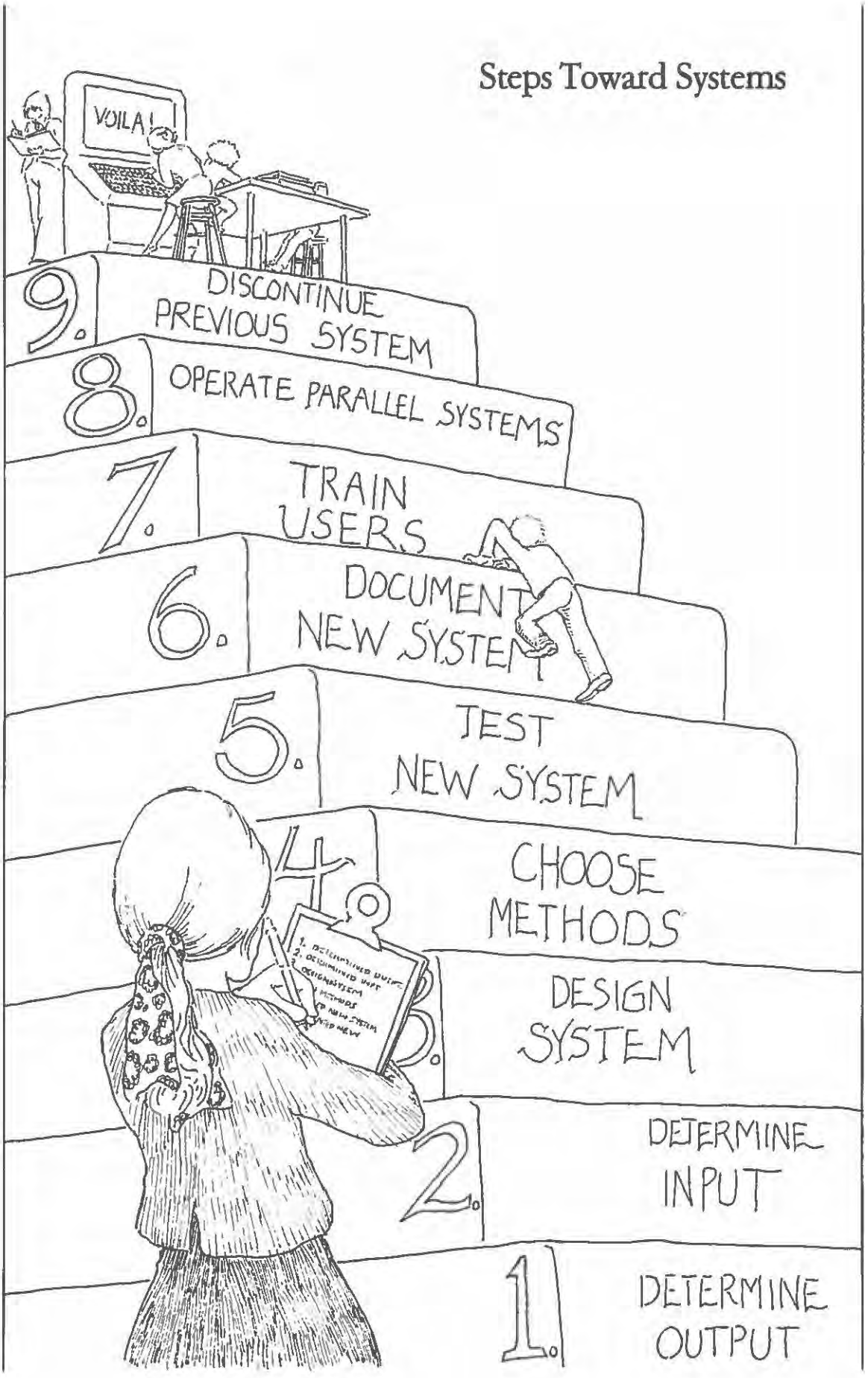
1. Written comments and specific revision proposals will be submitted to the National Assembly of State Arts Agencies office at any time. (See pp.189-192 for Reader's Comment Forms. If they have been removed, address your comments to NASAA, 1010 Vermont Avenue, N.W., Suite 316, Washington, D.C. 20005.)
2. These comments and proposals will be reviewed by staff periodically and forwarded to the NISP Policy Committee with recommendations.
3. The NISP Policy Committee will recommend amendments based on its own review of proposed changes and its consideration of staff advice.
4. NISP Policy Committee recommendations will be submitted to the NASAA membership and to all other interested parties in the arts community for review and comment.
5. The NISP Policy Committee will make formal amendment recommendations to the NASAA Board every four years.
6. The NASAA Board will take action on NISP Policy Committee recommendations, after which new system specifications will be published and go into effect within a realistic and Board-approved time period.

Conclusion

The National Standard for Arts Information Exchange provides a means to collect and analyze compatible information about public arts agency constituents, activities, and resources. It results from a conviction that information systems have benefits beyond those of supplying accurate data with which to perform daily tasks and to serve the needs of individual agencies. In its three systems, the National Standard furnishes a powerful tool to the entire arts community. If this tool is used properly, arts agencies will be able to gather their separate information resources to identify both what they have accomplished collectively and where future energies should be concentrated to increase and improve public understanding of and support for the arts.

On the other hand, if research opportunities are abused, if information is collected simply because it exists, or reports are generated without thought to their value, wise planning and decision-making in public arts agencies will have a precarious future. NISP and the National Standard represent only a beginning of the realization that information leads to power. They will inspire even greater curiosity about what other systems and more sophisticated systems could do, which national research efforts might benefit from systems development, and how the arts management business could profit from the latest information processing technology. When this happens, it will be essential that public arts administrators know how to use the information resources they have intelligently and creatively.

Steps Toward Systems



Chapter IV

Steps Toward Systems: Implementing the National Standard

In previous chapters, we have examined the concepts behind developing and using information systems, and have discussed the specific components of the National Standard for Arts Information Exchange. While the National Standard provides many things to an arts agency desiring good mailing list, grants management, and arts resource directory systems, there is much that an agency will have to do for itself before information systems of any type are in place and operating efficiently. It is with these additional steps that we are concerned in the present chapter.

It is important to remember that the National Standard information systems for mailing lists, grants management, and arts resource directories were developed within a national framework and do not, therefore, take into account every agency's special program, constituent, accounting, and operating needs. Those terms, definitions, and reporting requirements which are *needed* or *useful* in an information system or for a national exchange of arts information, and are therefore part of the Standard, do not necessarily include *all* the requirements of every public arts agency. In fact, the National Standard deliberately omits items which are useful only in unusual situations, need not be maintained consistently, or relate to data collected for documentary purposes only. Yet these are legitimate parts of many arts agency information systems. Moreover, the National Standard systems are information systems in a limited sense; they do not include the people, equipment, procedures, and policy aspects of arts agency information management. These must be determined individually by arts administrators who have established what information their agencies need and why they need it, and have prepared to take the steps necessary to achieve their management goals within the context of nationally compatible information systems development.

Nine Steps

This chapter will examine nine steps which are essential to the process of implementing National Standard information systems. They are:

Step 1: Determine Output
Step 2: Determine Input
Step 3: Design System
Step 4: Choose Methods
Step 5: Test New System
Step 6: Document New System
Step 7: Train Users
Step 8: Operate Parallel Systems
Step 9: Discontinue Previous System

These nine steps should be followed by each agency developing or revising an information system, regardless of its purpose or type. *No steps should be omitted.*

Before looking at each of these steps in detail, however, it will be valuable to review what an arts agency must accomplish *before* it embarks on a journey of planning, designing, and implementing an information system.

First, the agency should perform the preliminary analysis of its information requirements described in Chapter II. This process begins with a review of the agency's organizational goals and objectives in order to clarify what constituents the agency serves and what information must be available for it to serve them. Then the agency must establish priorities for information management and systems improvement, consciously choosing to obtain and maintain data conducive to achieving agency goals. The agency must also take time to analyze and evaluate the people, equipment, and procedures comprising its present information systems. Only after a thorough management review, which considers needs, priorities, and present capacities to meet information requirements, will an agency be ready to determine which information system should be revised or developed first.

Second, the agency preparing to implement a National Standard information system should establish a plan for accomplishing each of the system development steps. It should include the functions and responsibilities of each staff member to be involved in the process, including those at top management levels. It should detail the procedures necessary to accomplish the nine steps, and provide deadlines for each. Above all, it should be realistic, allowing adequate time for the research, planning, and plain hard work which each step will require. As we have noted, there are no shortcuts to improving information systems. An agency embarking upon such a project should be prepared from the beginning for the time and effort which will be required and the problems it will likely encounter.

Finally, agency staff members responsible for implementing an information system should become thoroughly familiar with the National Standard for Arts Information Exchange. They should pore over Chapter III and the Standard (pp.105-167) until they understand the unique functions of each National Standard system and the Constituent List. They should be able to define the three system components and understand the purposes and uses of the systems' various codes. Staff members should know what distinguishes Necessary, Optional, and additional system components, and should be well versed in what constitutes compliance with the National Standard. And, of course, they should be thoroughly acquainted with the terms, definitions, selections, and reports relevant to the specific system they are implementing. Until this knowledge has been mastered, the staff will not be capable of developing a system which meets the agency's minimum information requirements.

Three Agencies

As we consider the steps which constitute the remainder of this chapter, we will become acquainted with three hypothetical state arts agencies of different sizes and from different parts of the nation. These arts councils — we will call them Agencies A, B, and C — will illustrate how to implement an arts resource directory, mailing, and grants management system, respectively. The systems they implement are described here as examples only; they do not necessarily represent complete or recommended information systems.

As one of its services to constituents, Agency A offers referrals of performing artists available to organizations for workshops and residencies. For years the agency has relied on a staff member who is familiar with many of the artists and arts organizations in the state and can usually make appropriate suggestions. But she is retiring. In order to continue offering the referrals, Agency A wants to set up a *resource directory* of artists.

Agency B has maintained its mailing list on paper cards for eleven years. Each time a mailing is required, the secretary takes the cards to a mailing company where they are photocopied onto labels. The list has grown to include 5,400 cards, sorted and filed in ZIP Code order. There is no way the agency can obtain an alphabetical list of the names to look for errors and duplicates, although there are many of each. And more importantly, postage and printing costs associated with using the cards are getting to be too expensive because the system is unable to select certain people or organizations for a mailing; with these cards, it is all or nothing. Consequently Agency B has decided to revise its *mailing list* system. The information needed in the new system will be the same as that on the cards (names and addresses), except that a code should be added to facilitate selecting specific parts of the list for special mailings. The new system should also be able to sort all selected names and addresses by ZIP Code, and occasionally provide a printed edit list in alphabetical order. Finally, the mailing system must be able to print pressure-sensitive labels for small mailings and Cheshire labels to save money and time on large mailings.

Agency C has a large financial assistance program which offers competitive grants and fellowships to arts organizations and individual artists. Guidelines, documents, and deadlines vary somewhat for each grant category, but all applications are reviewed by the staff, a panel, and the Council before a decision is announced. The agency's recent program appropriation increase from the state legislature has enabled it to increase budgets for all its financial assistance categories. As a result, however, the two grants office staff people are processing more grant applications and having a harder time each quarter preparing application summaries for review panel and Council meetings. In fact, the last time the panel met, the staff worked late evenings for a week in an effort to process all grant applications before the meeting. To complicate the situation, the state legislature is becoming increasingly interested in the agency's grant programs. Legislators call regularly for information about "my district" which arts agency staff people cannot provide without days of research. The present system of cards and logsheets is too slow for the volume of applications being processed, and as time passes its inadequacy increases. Agency C hopes to replace it with a new *grants management* system providing faster, easier access to information and more accurate responses to a variety of grant-related questions.

Step 1: Determine Output

The first step in revising or developing an information system is to determine the "output" of the system, that is, to decide

- what the system must provide to meet the agency's needs; and
- how often and how quickly this information will be required.

An agency's information needs may be imposed by legal responsibilities (such as the reporting requirements on a grant from the federal government); they may be politically inspired (such as informing legislators of grants awarded in their districts); they may pertain to constituents' needs (such as maintaining directories of sponsors for touring companies); or they may be related to programming and internal management (such as maintaining grant project statistics upon which planning decisions will be based).

Information systems provide data by producing output on a scheduled (e.g., monthly) or as-needed (e.g., upon request) basis. Accurate descriptions of the frequency with which both regular and unscheduled information will be needed are an important part of determining a system's output. Getting the mailing list for a quarterly newsletter only once a year will not meet an agency's needs; receiving the labels twice a month, on the other hand, would be an unnecessary expense.

System output is determined most easily by making a comprehensive list of the kind of information needed, how often it is required, and in what form or order it should appear. Items on a list of scheduled output could be:

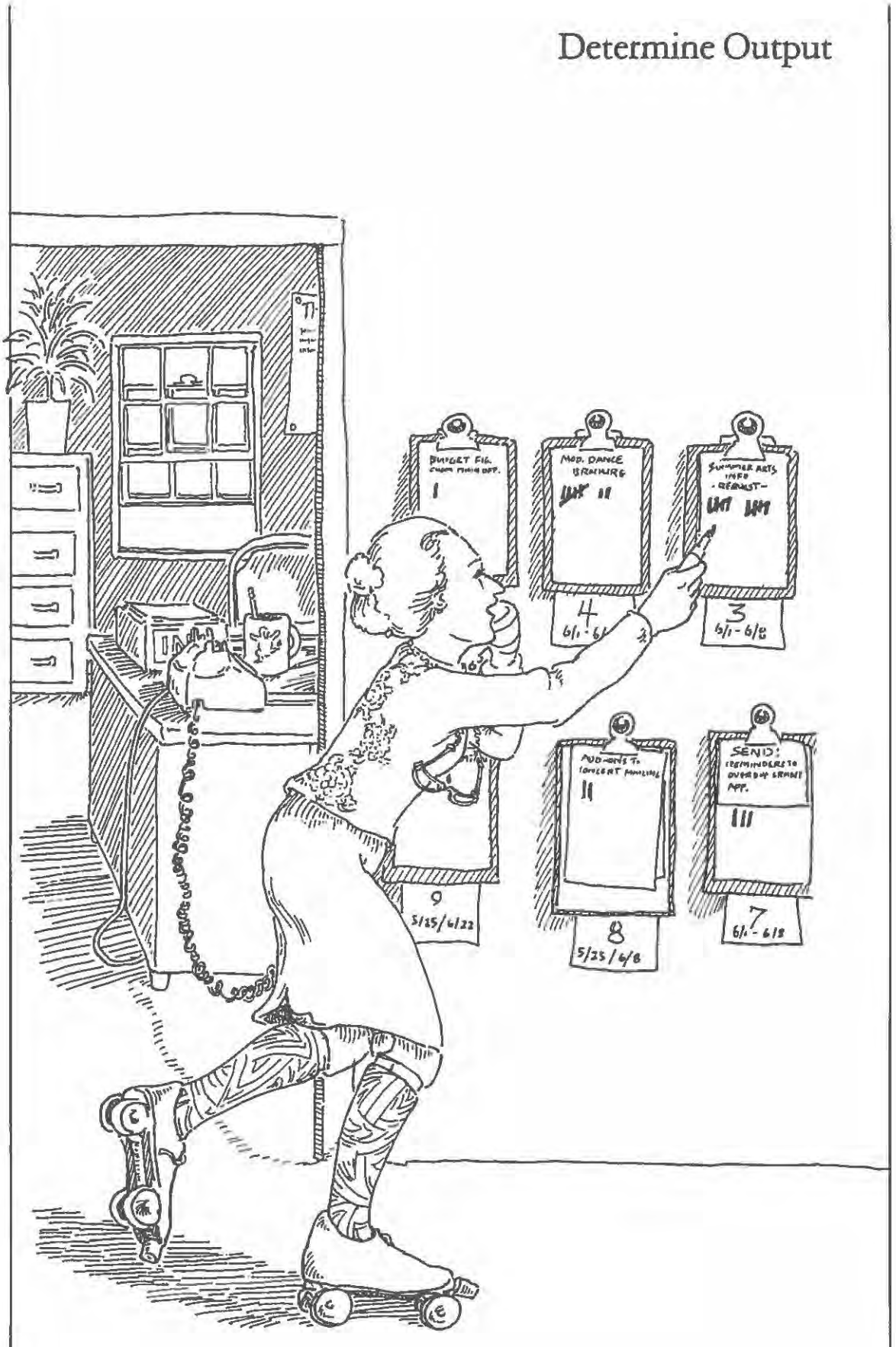
> On the first of every month, we need a list of grants awarded the previous month within each arts discipline, showing the grantees' names and cities, the dollar amount paid to date, and the account category.
>
> or
>
> Once every three months, we need a set of Cheshire labels in ZIP Code order of all the people on our mailing list who are supposed to get the quarterly newsletter.

As-needed output from an information system might be described as follows:

> Whenever someone calls from the comptroller's office (approximately once or twice a month), we need to know the balance in the touring program account.
>
> or
>
> Within two days of receiving a grant application, we need to send out an acknowledgment letter.

Sometimes an agency's needs impose special demands upon the output capabilities of its information system. For example, government agencies may demand that a particular report be filed on a special form, such as a granting agency's own report form or the Internal Revenue Service's Form W-2, which summarizes an employee's salary and wages. When this is the case, the output list should indicate that the system must be able to type data on a particular document or in a unique manner. Other examples of special output demands are the National Standard Grants Management System report formats, or the need to produce a grant summary sheet which fits an 8½" x 11" council notebook.

Determine Output



Finally, it is important to note here that public arts agencies choosing output specifications for their information systems must regard much of the data they decide to report as public information. Just as many agency files are legally open to public scrutiny, so is the output of an information system. Consequently, some agencies have opted not to collect, analyze, or report information which is particularly sensitive or politically volatile, unless specifically required to do so. Others have developed policies on the use and release of information to insure that it is presented and disseminated in a context most likely to encourage its accurate interpretation. For example, if a legislator asks for a list of all museum grants because a museum in her district is displeased with the outcome of its application, the agency may enclose with the list an explanation of the decision on the unhappy museum's request. Another agency might deliberately omit grant request amounts from a published list of grant awards in order to prevent misunderstanding of the "percentage of request funded" in cases where applicants asked for more than program guidelines permitted. So while arts agencies should avoid the trap of preserving poor systems to make it impossible for the public to scrutinize their activities — thereby precluding opportunities to rectify undesirable situations on their own as well — they should also be aware of the possible abuse of their information system output.

Agency A

The arts council planning to develop a *resource directory* of artists in order to continue its referral service came up with the following list of information system requirements:

1. Whenever someone requests an artist's name for a workshop or residency (approximately ten times every week), we need to be able to provide the names, addresses, and telephone numbers of artists in a certain county and working in a certain arts discipline.
2. Within two days of a call for information, we need to send out written confirmation of the referred artists' names, along with their addresses, telephone numbers, and reference lists of previous workshop and residency sponsors.
3. Once a year, we need to contact all artists in the directory to update their addresses, references, and other descriptive information.

Agency A's system output requirements are not complicated. If it had wanted to send out individually-typed letters when responding to referral requests, for example, this would have been listed as an additional requirement. But after considering the matter, the agency's director decided that photocopied forms would be adequate.

Agency B

The arts agency planning to revise its present paper card *mailing list* system described its information output needs as follows:

1. Once a month, we need a ZIP Code-sorted set of Cheshire labels for the newsletter portion of the mailing list.
2. Once a month (two weeks before the newsletter is ready to go out), we need a list of everyone on the mailing list in order to make necessary corrections.
3. Anytime at all, with three days' notice, we need to be able to get a list or labels (Cheshire or adhesive) for any particular group on the mailing list, such as all nonprofit organizations, individual visual artists and photographers, people in a certain ZIP Code region, or entries which have not been updated within the last year.
4. Anytime at all, with three days' notice, we need to be able to get a count (no lists or labels) of the total number of entries for any particular group on the mailing list so we can tell the printer how many copies of a certain mailing we will need.

Agency B must also estimate how frequently its "anytime at all" needs will occur — does this happen once a year, once a week, or somewhere in between? — since this will affect the eventual cost and required sophistication of its information system. After thinking about how they plan to use their mailing system, staff members estimated that Output 3 will be required approximately twice a month and Output 4 will be needed eight times a year. They noted, however, that if the agency decides to make its list available to constituents, both estimates will have to be increased considerably.

Agency C

The arts council replacing its inadequate *grants management* system arrived at this system output list:

1. Just before each quarterly panel meeting, we need lists of all applications sorted by applicant (showing past funding and current request), discipline (to help evaluate demand), or county (to see the geographic distribution of requests and grants).
2. Three days after each panel meeting, we need lists of all panel recommendations to include with the Council's application packet, sorted by applicant, discipline, or county.
3. Three days after each quarterly Council meeting, we need lists of all grants awarded, one for each legislative district in the state.
4. Five days after each Council meeting, we need lists of grants awarded organized by city or county, to prepare press releases announcing grants.
5. Two weeks after each Council meeting, we need lists of grants awarded sorted by type of project activity, to look for trends which may necessitate modifying our programs or guidelines.
6. Whenever an applicant calls to inquire (which could happen as often as ten times daily during peak periods), we need to be able to find out whether his grant check has been prepared, and if so, when.
7. Every three weeks, we need to send reminders to applicants whose final reports are overdue.
8. Once a month, we need a report showing grant funds encumbered to date, sorted by fiscal year and account, so we can reconcile grants office and accounting division records.
9. Once a year, we need lists and summaries of all grants awarded using funds from the National Endowment for the Arts' State Programs office.
10. When the legislature is in session, whenever a legislator has a question, we must be able to answer the question using accurate statistics.
11. Just before we print our annual report each year, we need a list of all grants awarded that year organized by city, and total dollar summaries by discipline and type of project activity.

Agency C's experience with its present grants system revealed the need for regular reports organized in a number of ways, for data and notices provided to several parties in a timely fashion, and for immediate responses to certain inquiries. Its list of system output requirements reflects these information management priorities.

Step 2: Determine Input

Once it is clear what information a system must provide to meet an agency's objectives and how often this information will be required, the agency is ready to decide what data need to be put into the system in order to produce the desired output. This step is called determining the system's "input" requirements.

An information system's input will be largely determined by the output list developed during Step 1. For example, if an agency decided that one output requirement is:

> "Every three weeks, we need to send reminders to applicants whose final reports are overdue,"

it is apparent that its grants management system must include data on who received grants, when their reports are due, and whether their reports have been received.

The simplest way to determine system input is to name and define the *fields* (spaces allocated for items of information) necessary to generate each output requirement. As we noted in our discussion of fields in Chapter III, every field must have a name (to identify the information to be contained in it), and a definition (to insure that everyone using the system will understand the field name in the same way). The order in which information fields are listed is usually insignificant, since most systems can reorganize them as needed. But for planning purposes, an agency may wish to group its fields in a logical order. The agency illustrated above determined that four fields are needed to produce the output it desires:

Applicant*
One constituent from the Constituent List. (See Constituent List for definitions.)

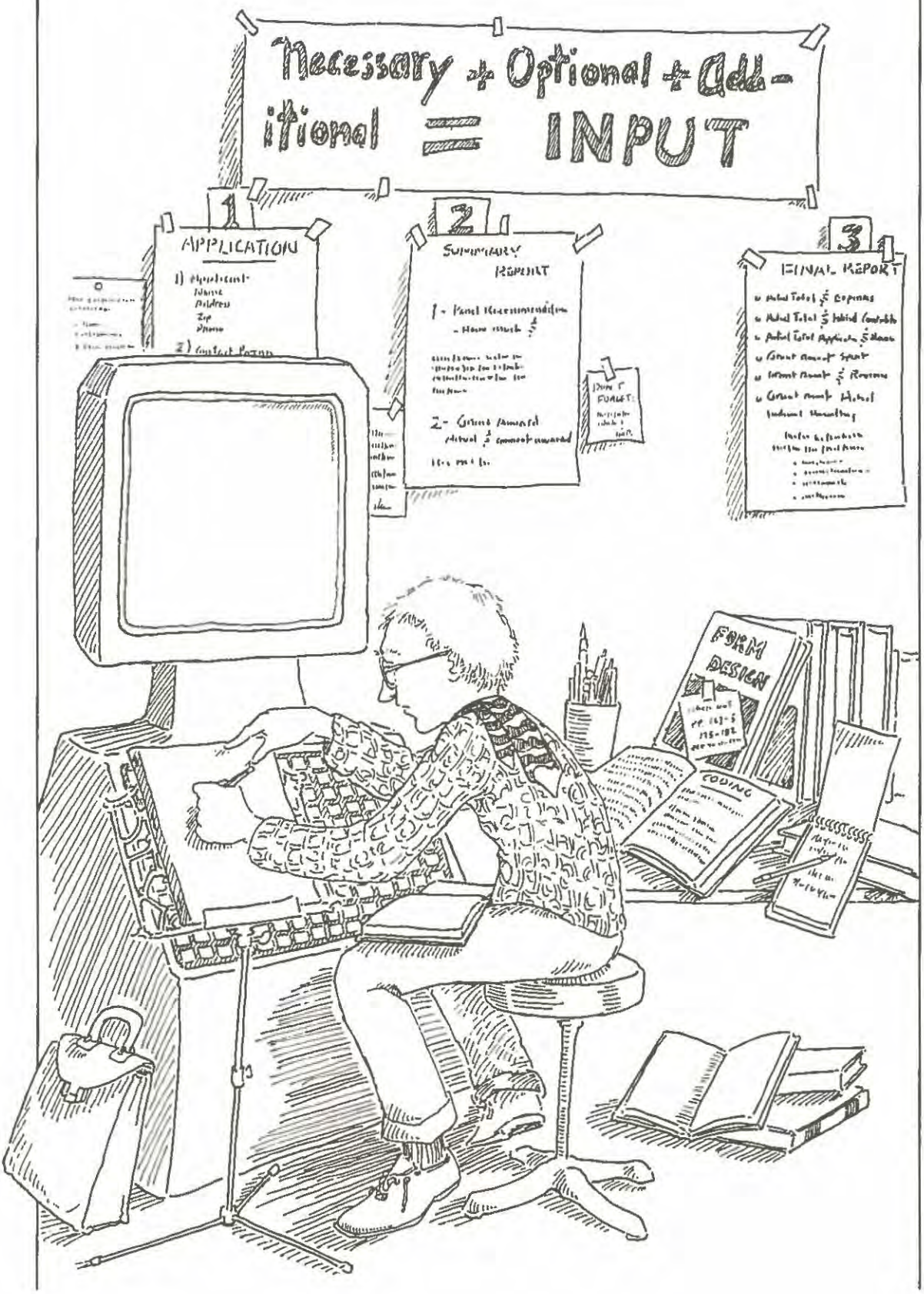
Grant Award*
Dollar amount of grant awarded. If the application was not funded, enter 0. A blank field indicates that a decision has not been made.

Date Report Due*
Date on which final report of "Applicant's" project is due.

Date Report Received*
Date on which final report of "Applicant's" project is received in agency office.

*from the National Standard

Determine Input



Another factor determining which fields will ultimately appear on an agency's input list is the National Standard for Arts Information Exchange. As we have seen, the National Standard includes the names and definitions of hundreds of fields which might be included in mailing list, grants management, and arts resource directory systems. For purposes of national compatibility, some of these fields must appear on an agency's input list regardless of whether they are mandated by output requirements. For example, before the National Standard was developed, few agencies needed data on their grant applicants' congressional districts. Therefore a report by congressional district probably would not have appeared as a system output. This is needed nationally, however, and consequently "Congressional District of Applicant" is a Necessary field in the National Standard. Thus, to insure that its system will meet all national requirements, an agency should determine input using the National Standard in this manner:

1. Use *all* National Standard *Necessary* fields appropriate for the information system being developed.
2. Choose the National Standard *Optional* fields needed to accomplish output objectives.
3. Add any *additional* fields needed to accomplish output objectives, making certain they do not replace or redefine National Standard fields.

As an agency begins the task of determining input fields and definitions, it will have to face the issue of how to collect the data which will comprise the entries in its information system. Will it be gathered on a questionnaire specifically designed for the task as is likely when the system is an arts resource directory? Or will the data come into the office via telephone calls, subscription forms, memos jotted by staff people, or "Address Correction Requested" mail returned by the post office? Will one system entry draw its fields of information from a variety of sources, such as the application documents, panel and council summary sheets, report forms, and grant history logs which make up a grants management system?

Thinking about how it will assemble the data it needs should encourage an agency to evaluate how it presently uses the tools of the information management business. And if current documents and practices are inadequate to produce required system input, the agency will need to design new information gathering instruments. Questions must be worded carefully and contain no ambiguities. Layout should reflect a logical progression of thought, and design should be consistent with other material produced by the agency. Application and report forms for all grant programs should use a standard cover page and "for office use" section to gather basic input data on all applicants and projects and to document each application's progress through the review process. Final report forms should not surprise the applicant with requests for data in new and unusual combinations, but rather should enable him to report specific, useful information about the project completed. In short, how an agency chooses to gather data and what tools it provides for that purpose will significantly enhance the quality of the information it receives and the effectiveness of its system.

An agency's plans for editing and proofreading its input data are also crucial to the development of an effective information system. Staff members who are thoroughly familiar with the system's input fields, definitions, and all of the questions on forms and documents must be available for these tasks. As information is obtained, these people must edit it to make certain that it is consistent with field definitions. They should read the entire form or questionnaire, making sure all required fields are provided and the arithmetic is accurate. They must scan the data for misunderstandings and correct any they find. Finally, after information is input to the system (e.g., transcribed on cards or logsheets, typed into a computer), someone must faithfully proofread every entry. Only *people*, working as part of an information system, are capable of distinguishing between accurate data and errors; given incorrect data, an information system will simply use them in all reports it produces, possibly compounding the problem as it does so.

To simplify the process of obtaining accurate, consistent data for system input, an agency may plan its questionnaires and documents to include some field definitions, either as part of a question (e.g., "What is your function or purpose in the arts?"*) or in a list of instructions. And in some instances, it may wish to streamline the editing process even further by having a knowledgeable staff person provide the information needed. An example is the National Standard Grants Management System field "Discipline," which describes the arts discipline in which project activities are involved. A staff person familiar with the code will know that a mime performance should be classified as "theatre," although the applicant or mime artist might be inclined to list the event under "dance." But printing the entire code *and* its definitions on the application form would take a prohibitive amount of space. So the agency could solve the problem by having someone assign the "Discipline" field when the application is received.

The business of deciding how to collect reliable information and planning the essential editing and proofreading processes inevitably brings up the matter of the work and expense involved in gathering, recording, and processing data. Agencies should remember that the decision to collect just one field is a decision to collect, edit, input, proofread, and maintain that field for *every* entry in the system. So an agency which includes the field "County" on its 10,000 name mailing list, for example, has made a commitment to gather, record, and report that field not once, but at least 10,000 times. Likewise the agency which receives 1,000 grant applications per year and has 80 data fields in its grants management system, must have the wherewithal to handle 80,000 pieces of information annually. With this in mind, agencies must weigh every input field being considered for the system against the time and cost of collecting and maintaining it. Information should not be gathered simply because it exists; the decision to collect it must be tied to an agency's needs. A close appraisal of the work incurred in collecting certain data fields may lead to a reevaluation of the system output determined in Step 1; some information requirements may simply not be worth the time and expense of satisfying them.

Finally, an agency must consider how it will schedule input to its system — that is, when each entry will initially be added to the system and how often it will be changed or updated. It should then plan procedures to insure that the staff will be able to input data in a logical, efficient manner. For example, in a grants management system, data input is normally scheduled in three groups: first, applicant and project fields from the grant application are recorded; second, panel and council recommendations and decisions are noted; third, data from the final report are recorded for any applications which were funded. Periodic changes may be made to correct errors or revise the applications, but most input is handled during these three major operations. Thus, if grants management data were to be typed into a computer, staff would enter groups of pertinent fields three times per grant cycle. In a mailing list system, on the other hand, input is usually done randomly and continually — there is no way of knowing which addresses will change or when those changes will take place. Therefore an agency might describe timing of input to a mailing system as follows: "Twenty new entries will be added and two percent of the fields will change each month." Then, depending upon staff availability and use frequency, procedures would be established to insure that the mailing list was always updated and proofread *before* each major mailing had to go out.

Now let us take a look at how the three state arts councils determined their system input.

Agency A

The agency developing a *resource directory* plans to continue gathering its information on performing artists who do workshops and residencies by sending a simple one-page questionnaire to everyone on its list every year. The person who will be responsible for the directory will edit the returns, and when anyone else learns of an address change, she will be notified. Because the timing of changes to the directory was nearly impossible to predict, the agency had difficulty developing an input schedule. However staff members have estimated that four percent of the entries will change in some way each month, with a thirty percent change rate expected after the annual update mailing. They also anticipate that the directory will grow about five percent each year.

*from the definition of FUNCTION in the National Standard Mailing List System "Mail Code."

Agency A came up with this list of input fields and definitions:

Individual*: Name
Address 1
Address 2
City
State
ZIP Code
One constituent from the Constituent List. (See Constituent List for definitions.)

Home Telephone*
The home telephone number of "Individual."

Other Telephone*
Another telephone number of "Individual."

County*
The county of "Individual's" residence.

Discipline*
The arts discipline in which "Individual" is involved. (The National Standard code will be used.)

Type*
The type of "Individual." (The National Standard code will be used.)

Audience Type*
The types of audiences for which "Individual's" programs are appropriate. (The National Standard code will be used.)

Update Date
Date of the most recent update to this entry.

Reference 1: Contact Person
Organization
Telephone
The name of a person who has booked "Individual" for a workshop or residency; the name of the organization with which "Contact Person" is affiliated; a telephone number where "Contact Person" can be reached during business hours.

Reference 2: Contact Person
Organization
Telephone
Definitions are the same as those for "Reference 1" above.

Reference 3: Contact Person
Organization
Telephone
Definitions are the same as those for "Reference 1" above.

In choosing these fields, staff members at Agency A first looked at the National Standard Arts Resource Directory System for "Individuals in the Performing and Literary Arts" to determine which fields were Necessary. They discovered that there are no Necessary fields in the Arts Resource Directory Systems. So they chose the Optional fields needed to provide the information they wanted on each artist, and finally created additional fields and definitions for data not covered in the National Standard.

Agency B

The arts council revising its *mailing list* expects to continue receiving additions and changes to the system over the telephone, on subscription slips clipped from the quarterly newsletter, and in response to annual "clean up" mailings when entries not updated within the last year are sent a questionnaire and asked to confirm their addresses and codes. The agency's secretary will edit data received for the system, but program directors, who are familiar with many constituents, will assist her with coding if necessary. She plans to allocate enough time each month for updating approximately five percent of the list, and estimates that after the "clean up" survey she will be handling changes related to at least ten percent of the entries.

Agency B's list of fields and definitions was easy to compile:

Contact Person*
The person to contact for additional information about "Name (organization or individual)" if that field is an organization. If that field is an individual, no contact person should be listed.

Name* (organization or individual)
Address 1*
Address 2*
City*
State*
ZIP Code*
One constituent from the Constituent List. (See Constituent List for definitions.)

*from the National Standard

Mail Code*
A descriptor designed to enable an agency to select particular groups of constituents for specific kinds of mail. (The National Standard code will be used.)

"TARGET": STATUS
FUNCTION
INSTITUTION
DISCIPLINE

"CONTENT": The 19 National Standard categories
20 Newsletter
21 Press Releases
22 Program Guidelines

Telephone
The daytime telephone number of "Contact Person," if any, or "Name (organization or individual)."

Update Date
Date of the most recent update to this entry.

In Agency B's mailing system, most of the fields are National Standard Necessary fields. As the Standard suggests, the agency added some categories to the "CONTENT" code to reflect its own special mailing needs. These will not appear on the coding questionnaire mailed to constituents, but will be assigned by staff in the office. "Telephone" has been added because Agency B would like the mailing system to double as a constituent telephone directory. "Telephone" is not a field in the National Standard Mailing List System, but its inclusion here will not conflict with any Necessary or Optional fields. Finally, the arts council decided to add the field "Update Date" to flag entries which may have become obsolete and should receive the "clean up" mailing.

Agency C

The agency designing a new *grants management* system will obtain input data for each entry in the following ways:

1. The grant application form will supply most data describing the applicant and project.
2. Staff people will assign some codes (e.g., "Discipline," "Type of Activity") and all fields relating to the grant process (e.g., "Application Number," "Account").
3. Grant summary reports completed at panel and Council meetings will provide information on the application's review (e.g., "Panel Recommendation").
4. Evaluation reports completed by grantees at the end of the project period will show how funds were eventually spent.

The two grants office staff people will edit, input, and proofread grant system data when applications arrive, when recommendations are made, and when grantee final reports are received. They will also update the system when an applicant telephones to report a change in project date, for example, or submits a revised grant request. To simplify their task somewhat, grants office staff members will work with Agency C's graphic designer to modify all existing grant documents. Their objective is to develop identical application and report cover sheets, instruction pages, and summary reports for all funding categories, and to group system input fields together wherever possible.

Agency C developed the following list of input fields and definitions:

FIELDS OBTAINED FROM APPLICATION FORM

Applicant*: Name (organization or individual)
Address 1
Address 2
City
State
ZIP Code

One constituent from the Constituent List. (See Constituent List for definitions.)

Contact Person*
The person to contact for additional information about the application.

Telephone*
The office telephone number of "Applicant" or "Contact Person."

County of Applicant*
County or parish of the office immediately responsible for the application. In most cases, this would be the county in which "Applicant's" business address is located.

Legislative District of Applicant (House)*
District of state legislative representative body (commonly the state House of Representatives) in which "Applicant's" business address is located.

Legislative District of Applicant (Senate)*
District of other state legislative body (commonly the state Senate) in which "Applicant's" business address is located.

Congressional District of Applicant*
District of the United States House of Representatives in which "Applicant's" business address is located.

(continued)

*from the National Standard

Start Date*
The first date of activity in the project for which assistance is requested.

End Date*
The last date of activity in the project for which assistance is requested.

Grant Amount Requested*
Amount requested in support of this project.

FIELDS ASSIGNED BY STAFF MEMBERS

Date Received*
Date application is received in agency office.

Application Number*
An indicator assigned to the application and used in reference to it on other documents.

Discipline*
The arts discipline in which project activities are involved. (The National Standard code will be used.)

Type of Activity*
The type of activity which best describes the project activities. (The National Standard code will be used.)

Account
Code from Agency C's financial management system "Chart of Accounts" which designates the account to be debited when grant payment is made.

Check Number
Check number of grant payment.

Check Date
Date of grant payment check.

Date Report Due*
Date on which final report of "Applicant's" project is due. Typically 30 days after "End Date."

Date Report Received*
Date on which final report of "Applicant's" project is received in agency office.

Update Date
Date of the most recent update to this entry.

FIELDS OBTAINED FROM SUMMARY REPORTS

Panel Recommendation
Dollar amount of panel recommendation.

Grant Award*
Dollar amount of grant awarded. If the application was not funded, enter 0. A blank field indicates that a decision has not been made.

FIELDS OBTAINED FROM FINAL REPORT

Actual Total Cash Expenses*
The total of National Standard Grants Management fields #89-#99.

Actual Total In-kind Contributions*
The total of National Standard Grants Management fields #101-#111.

Actual Total Applicant Cash Revenue*
The total of National Standard Grants Management fields #113-#122.

Grant Amount Spent*
Actual grant amount spent on the project.

Actual Total Cash Revenue*
The total of "Actual Total Applicant Cash Revenue" and "Grant Amount Spent" above.

Actual Individuals Benefiting*
Actual number of individuals benefiting as defined in National Standard Grants Management field #83 (i.e., the actual total audience, participants, students, etc., excluding employees and/or paid performers, that benefited directly from the project).

The fields comprising Agency C's grants management system reveal the agency's need for a variety of output data to be acquired on schedules ranging from several times daily to once a year. All twelve National Standard Grants Management Necessary fields are included, as are additional fields unique to this arts council's grant process. "Account," for example, is a field which is not needed in every system (e.g., one handling grants all paid from one account) or on a national basis. Nor could it be standardized nationally because of the variety of public arts agency accounting procedures. Despite the fact that "Account" is not required by the National Standard, however, it is ctucial here if Agency C is going to be able to obtain "lists and summaries of all grants awarded using funds from the National Endowment for the Arts' State Programs office." (OUTPUT 9, p.68)

*from the National Standard

Step 3: Design System

The third step in implementing an information system is to develop a plan or system design which establishes guidelines for how data will be

- stored,
- manipulated, and
- reported.

Storing Information

Before an agency is ready to determine where its information will be stored (i.e., whether it will be accumulated in paper files or on metal plates, punched cards, magnetic tape, or computer disks and diskettes), it must establish how information will be grouped in the system and what limits, if any, will be placed on the amount of data to be stored.

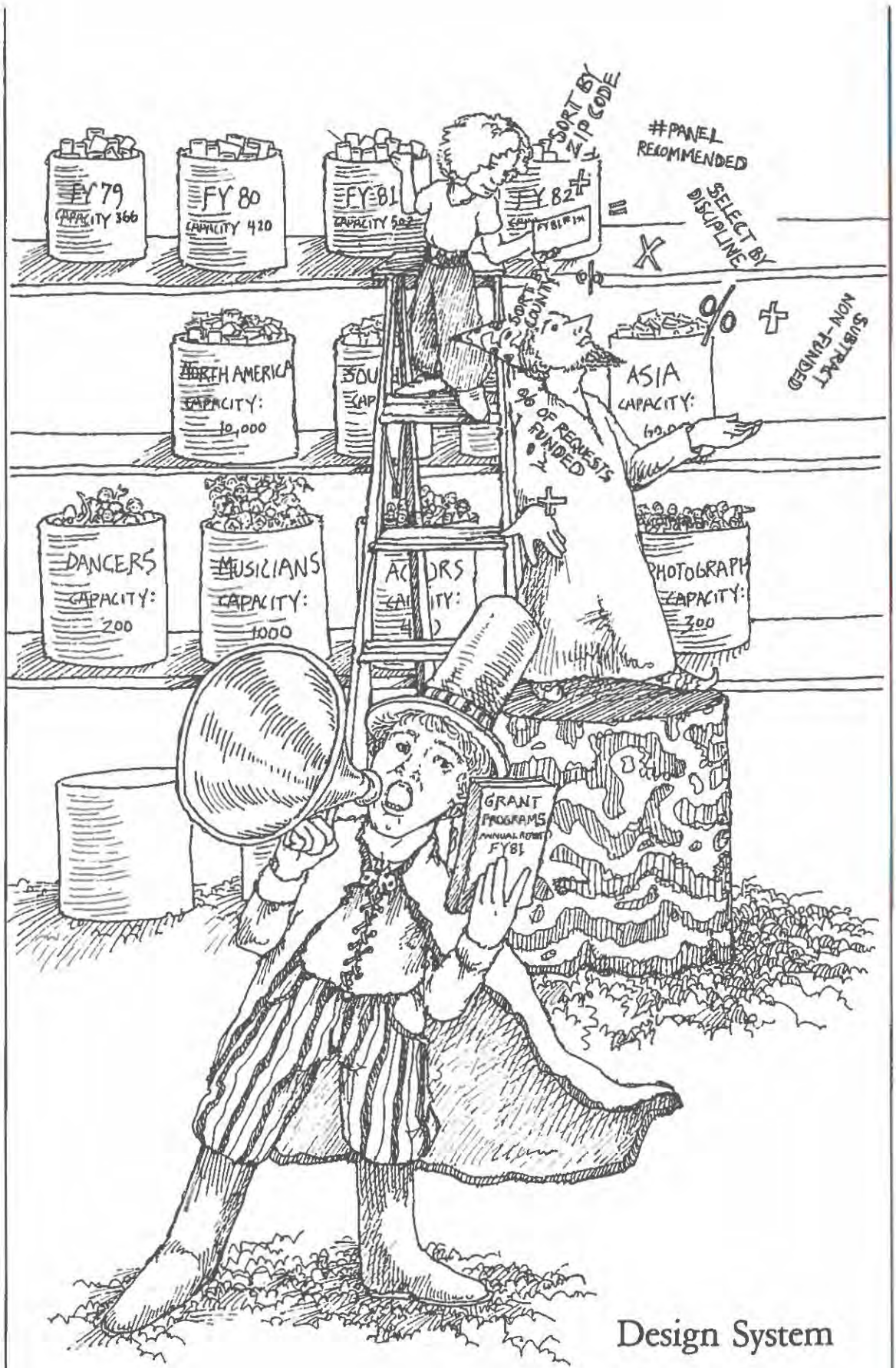
Designing an information system often includes planning to group data so that they will be accessible quickly and easily to the people using the system. For example, an arts agency's grant files might be grouped according to fiscal year, program categories, or arts disciplines. In a manual or mechanical grants management system, each group (e.g., "FY'81," "Dance Touring Program," or "Music") would probably be stored in separate file drawers, cabinets, or boxes. In a computer system, each would be on different tapes, disks, or diskettes, or on separate portions of these storage devices.

Grouping information in this manner allows easy access to small amounts of data without manipulating evetything in storage. And where the total amount of stored information exceeds a single storage device (as, for example, when it simply will not all fit in one drawer or on one diskette), grouping provides a logical way to divide the system's data. On the other hand, if two or more groups of information must be compared or used simultaneously, the system must be prepared to do extra work. For example, if an agency has grouped its grant applications by fiscal year but wants a report listing three years' grants in dance, the system must have the capacity to look at all three groups of applications, select those which were funded, and sort them according to arts discipline. If the applications originally had been grouped by discipline, the reverse would be true; compiling an accurate picture of just one year's grants would require the extra work. Consequently, when information must be grouped to provide easy access to limited amounts of what is available, an agency should group those entries most often used together.

Designing an information system also entails establishing how many entries the system will store and, often, a maximum size for each field in each entry. Both will help determine how much storage space is necessary and, therefore, the type and cost of the storage medium eventually selected. For example, if a directory system must hold 150 name and address cards in alphabetical order, an inexpensive storage device can be purchased in any stationery store. However, if the directory were to contain 350,000 voter registration cards, an expensive and bulky mechanical apparatus would have to be built to make the cards manageable. Likewise, if an agency will ever have to record county data on grant applicants from "WEST LAKE OF THE CHIPPEWA" County, it must either allow a 25-character "County" field for every entry in the system, or use a code to represent the information (see p.57). If the longest county name is "CHACE," however, then five characters will be adequate.

In manual systems, field sizes are usually dictated by the amount of space available on the document where information is to be written or typed. It is usually possible to "squeeze in" long names without redesigning forms and lengthening blanks. But in most mechanical and computer systems, field lengths are rigid — a certain number of characters are allowed and no more — and those characters must include any needed spaces, periods, commas, and other punctuation. In many mailing systems, for example, the "Name" field is limited to the thirty characters which will fit a standard 3 3/16" x 7/8" label. "GEORGE CARVER" (13 characters) fits fine; "MR. & MRS. GEORGE WASHINGTON CARVER" (35 characters) does not. In the latter case, an abbreviation to "MR & MRS GEORGE W CARVER" (24 characters) can be used instead. Because space is often limited, most people using computer systems do not include punctuation in any fields and rely on the use of abbreviations.

The National Standard includes suggested field sizes and standard abbreviations to assist agencies who must limit field sizes and condense information to fit them. As we have already seen, the field sizes are simply recommendations. The abbreviations are considered Optional; that is, it may not be necessary to abbreviate words, but if an agency decides to do so, it must use National Standard abbreviations. It is important that agencies choosing to abbreviate data remember to do so consistently, as this will affect the system's ability to locate stored information. For example, if a computer were asked to list all entries for which "Name" is "SOUTH BOSTON HIGH SCHOOL," it would find only those in which the name was spelled out in its entirety. It would not find "SOUTH BOSTON H S," "S BOSTON HIGH SCHOOL," "S BOSTON HIGH SCH," or "SOUTH BOS HIGH SCHOOL."



Design System

Manipulating Information

The second part of system design involves determining how the system will manipulate information, that is, what it will do with the input defined in Step 2 to produce the output determined in Step 1. There are three things a system can do to manipulate the information it stores:

- select,
- sort, and
- calculate.

As we saw in Chapter III, to *select* means to *pick out certain entries* according to specific criteria, such as "Get all grant applications from applicants in the first congressional district." Some applications will be picked; those not meeting the selection criteria will be left behind.

Likewise, we know that to *sort* means to *put entries in a new order* according to certain criteria, such as "Put these grant applications in alphabetical order by the applicant's name." All of the entries in the system will be used, and when the sort is complete, they will be arranged in a different order.

To *calculate* means to *perform arithmetical functions on stored data* according to specific instructions, such as "For each application, subtract the amount granted from the amount requested." Given this command, the system will use the fields "Grant Award" and "Grant Amount Requested" from each entry to calculate new pieces of information which might be called "Amount of Request Not Funded." The ability to calculate is the ability to generate numeric information which is neither input to nor stored in the system.

The National Standard includes selection criteria for two of its information systems. Determining additional selections and all required sorts and calculations is an essential part of system design.

Reporting Information

When a system has completed selecting, sorting, and calculating data, it has not yet provided the information in a useable form. In a manual system, the information is still on the clerk's scratch pad, calculator tape, or in a pile on his desk. In a computer system, it is still flashes of electricity. Before it can be used, the information must be reported.

The final part of system design involves establishing a format for how the output determined in Step 1 will eventually appear to the system's users. An agency must complete the design and layout of each report it needs from the system, and if significant, specify the material (paper, card, labels) on which the report should appear. As usual, applicable National Standard Necessary and Optional reports should be included in the system design.

In conclusion, we can summarize the system design step in the following manner:

- First, decide how information will be grouped in the system and what limits (total volume of entries and field sizes) will be placed on the amount of data to be stored.
- Second, for each output requirement determined in Step 1, list the selections, sorts, calculations, and reports needed.

This, then, is how the three state arts agencies designed their systems.

Agency A

Agency A had little difficulty determining storage specifications for its *resource directory* of workshop artists. There will be about 570 entries grouped together in one place. All the information needed fits well on a 4" x 6" index card (with the artist information on the front and sponsor references on the back), or on one side of an 8½" x 11" sheet of paper or card. For this reason, staff initially decided that unless the agency develops a computer system — which is unlikely — there was no need to limit field sizes. Allowing for margins and line headings, there will be adequate space to type even the longest names and references. However, Agency A needs to contact artists annually for the directory update, and it would be convenient to use standard adhesive labels for the occasion. Hence the need for some field limitations. So Agency A will allow no more than three inches apiece for the artists' names, address lines, and the group of fields: "City," "State," and "ZIP Code."

With this problem resolved, manipulation and reporting functions were easily listed as follows:

OUTPUT 1
Whenever someone requests an artist's name for a workshop or residency (approximately ten times every week), we need to be able to provide the names, addresses, and telephone numbers of artists in a certain county and working in a certain arts discipline.

Selection:	by "County" or by "Discipline"
Sort:	none
Calculation:	none
Report:	provide information verbally over the telephone

(continued)

OUTPUT 2
Within two days of a call for information, we need to send out written confirmation of the referred artists' names, along with their addresses, telephone numbers, and reference lists of previous workshop and residency sponsors.

Selection: by "County" or by "Discipline"
Sort: none
Calculation: none
Report: a photocopied form giving all required information on each artist referred

OUTPUT 3
Once a year, we need to contact all artists in the directory to update their addresses, references, and other descriptive information.

Selection: none (every entry will be selected for the update)
Sort: by "ZIP Code"
Calculation: none
Report: 3 3/16" x 7/8" adhesive labels in any combination

Name		
Address 1		
Address 2		
City	State	ZIP Code

Agency B

The arts council revising its paper card *mailing list* is working with one large group of names and addresses which should all be stored together to make selecting and sorting easy. There are presently 5,400 cards in the system, but the staff anticipates that when all duplicates and obsolete entries are removed, there will be about 4,800 names on the mailing list. Using National Standard suggestions whenever possible, Agency B developed this list of field size limits for its system:

Field Name	Number of Characters
Contact Person	20
Name (organization or individual)	30
Address 1	20
Address 2	20
City	16
State	2
ZIP Code	10
Mail Code	31
"TARGET" (9)	
"CONTENT" (22)	
Telephone	12
Update Date	6
TOTAL characters per entry	167

*from the National Standard

The following manipulation and reporting functions will produce the output requirements Agency B determined in Step 1:

OUTPUT 1
Once a month, we need a ZIP Code-sorted set of Cheshire labels for the newsletter portion of the mailing list.

Selection: by "CONTENT" code 20 (Newsletter) section of "Mail Code"*
Sort: by "ZIP Code"
Calculation: none
Report: "4-up Cheshire Labels"*

OUTPUT 2
Once a month (two weeks before the newsletter is ready to go out), we need a list of everyone on the mailing list in order to make necessary corrections.

Selection: none (every entry will be selected)
Sort: by "ZIP Code" and alphabetically by "Name (organization or individual)" within each ZIP Code section
Calculation: none
Report: "List"*

OUTPUT 3
Anytime at all, with three days' notice, we need to be able to get a list or labels (Cheshire or adhesive) for any particular group on the mailing list, such as all nonprofit organizations, individual visual artists and photographers, people in a certain ZIP Code region, or entries which have not been updated within the last year.

Selection: by one section of "Mail Code"* (e.g., STATUS, FUNCTION, INSTITUTION, DISCIPLINE, "CONTENT"), or
by any combination of "Mail Code" sections, including both "and" and "or" combinations,* or
by "ZIP Code,"* or
by "City,"* or
by "State,"* or
by "Update Date," or
by two or more fields*
Sort: by "ZIP Code," or
by "ZIP Code" and alphabetically by "Name (organization or individual)" within each ZIP Code section
Calculation: none
Report: "4-up Adhesive Labels,"* or
"4-up Cheshire Labels,"* or
"List"*

OUTPUT 4

Anytime at all, with three days' notice, we need to be able to get a count (no lists or labels) of the total number of entries for any particular group on the mailing list so we can tell the printer how many copies of a certain mailing we will need.

Selection:	see OUTPUT 3 above
Sort:	not applicable
Calculation:	total number of entries selected
Report:	description of selection (e.g., "Seattle Mailing List Entries"), date of report, total number of entries selected

Agency C

The agency developing a new *grants management* system has a more complicated task in system design because of its large number and variety of output and input requirements. Grant applications will most often be examined and compared within a single fiscal year, so it is logical to group them that way. Then when a panel report is needed, only the current year's applications will be reported, unless the system is specifically asked to include other fiscal years as well. The information groups and their total volumes are:

Group	Projected Number of Applications
Fiscal Year 1981	800
Fiscal Year 1982	950
Fiscal Year 1983	1,100
Fiscal Year 1984	1,300

The arts council plans eventually to maintain four groups of information in its system at one time: the current fiscal year's entries and those for three previous years. Thus, by Fiscal Year 1984, Agency C will have access to historical data for Fiscal Years 1981 through 1983. At the end of that year, it will add a new group to its system, "Fiscal Year 1985," and transfer the "Fiscal Year 1981" entries to its archives.

Having determined its information groups and volumes, Agency C assigned these field sizes to its list of input requirements:

Field Name	Number of Characters
Applicant	
Name (organization or individual)	30
Address 1	20
Address 2	20
City	16
State	2
ZIP Code	10
Contact Person	20
Telephone	12
County of Applicant	3
Legislative District of Applicant (House)	3
Legislative District of Applicant (Senate)	3
Congressional District of Applicant	3
Start Date	6
End Date	6
Grant Amount Requested	6
Date Received	6
Application Number	4
Discipline	3
Type of Activity	2
Account	5
Check Number	5
Check Date	6
Date Report Due	6
Date Report Received	6
Update Date	6
Panel Recommendation	6
Grant Award	6
Actual Total Cash Expenses	8
Actual Total In-kind Contributions	8
Actual Total Applicant Cash Revenue	8
Grant Amount Spent	6
Actual Total Cash Revenue	8
Actual Individuals Benefiting	8
TOTAL characters per entry	267

Finally, Agency C listed these selections, sorts, calculations, and reports needed to produce the first five output requirements determined in Step 1; numbers six through eleven were handled in similar fashion, but are not shown here. The only remaining task in Agency C's system design work is to add all National Standard Necessary selections and reports not directly indicated by output requirements.

OUTPUT 1

Just before each quarterly panel meeting, we need lists of all applications sorted by applicant (showing past funding and current request), discipline (to help evaluate demand), or county (to see the geographic distribution of requests and grants).

Selection: by "Panel Recommendation" (to pick out those not yet processed)

Sort: by "Applicant Name (organization or individual)," or
by "Discipline," or
by "County"

Calculation: total grant amounts requested

Report: see Figure 1

OUTPUT 2

Three days after each panel meeting, we need lists of all panel recommendations to include with the Council's application packet, sorted by applicant, discipline, or county.

Selection: by "Grant Award"* (to pick out those not yet decided)

Sort: see OUTPUT 1 above

Calculation: total grant amounts requested and total panel recommendations

Report: same as Figure 1, except "Panel Recommendation" will be printed and totaled

OUTPUT 3

Three days after each quarterly Council meeting, we need lists of all grants awarded, one for each legislative district in the state.

Selection: by "Legislative District of Applicant (House)," * or
by "Legislative District of Applicant (Senate)," * and
by "Grant Award"* (to pick out those that were funded)

Sort: by "City"

Calculation: total grants awarded

Report: see Figure 2

OUTPUT 4

Five days after each Council meeting, we need lists of grants awarded organized by city or county, to prepare press releases announcing grants.

Selection: by "City," * or
by "County," * and
by "Grant Award"* (to pick out those that were funded)

Sort: by "Applicant Name (organization or individual)"

Calculation: total grants awarded

Report: same as Figure 2

OUTPUT 5

Two weeks after each Council meeting, we need lists of grants awarded sorted by type of project activity, to look for trends which may necessitate modifying our programs or guidelines.

Selection: by "Grant Award"* (to pick out those that were funded)

Sort: by "Type of Activity"

Calculation: total grants awarded for each "Type of Activity"

Report: same as Figure 2, except there will be a total for every "Type of Activity" listed

*from the National Standard

Figure 1
Report to provide OUTPUT 1 for Agency C

Grant Summary and Previous Funding Report *
Agency C
00 / 00 / 00*

Applicant Name**	Application #	Amt Requested	Panel Recom	Discipline	County
Prev Year	Application #	Amt Requested	Grant Award	Discipline	County
Prev Year	Application #	Amt Requested	Grant Award	Discipline	County
Prev Year	Application #	Amt Requested	Grant Award	Discipline	County
		$	$ (blank)		
		$	$ (blank)		
		$	$ (blank)		
	TOTAL	$	$ (blank)		

Figure 2
Report to provide OUTPUT 3 for Agency C

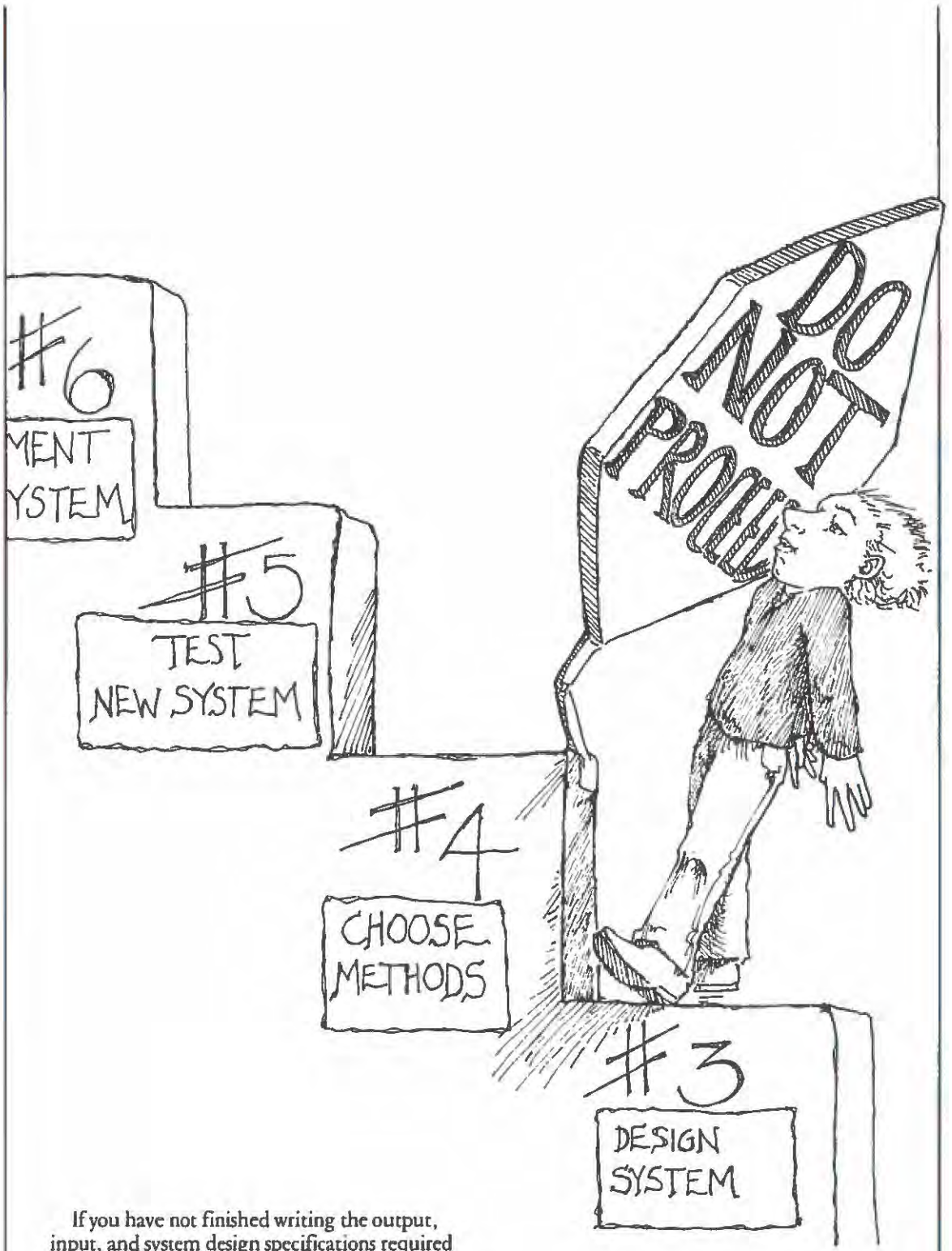
Grants Awarded in Legislative District 000***
Agency C
00 / 00 / 00

Applicant Name	City	Grant Award	Discipline	Type of Activity
		$		
	TOTAL	$		

* It is assumed that each report will be named and dated.

** If sorted by "Discipline" or "County," the format will remain the same.

*** If selected by "City" or "County," the city (Poughkeepsie, for example) or county (Dutchess County) will be shown in the title of the report.



If you have not finished writing the output, input, and system design specifications required in Steps 1, 2, and 3 for the information system you are implementing, *do not proceed beyond this point!* There is no shortcut through these three steps. Even if you have a short timetable, a specific budget, and saw the computer you want in the store window, take the time to complete Steps 1, 2, and 3 before you continue to Step 4.

Step 4: Choose Methods

Once an agency has decided what its information system should do, it is time to choose a way to do it. Step 4, "Choose Methods," introduces the subject of equipment to the planning and implementation process as it poses the question: how is the system going to do what it needs to do?

It is crucial for someone making an important decision to be aware of all the options available and be equipped to evaluate them and make the appropriate selection. This is especially true of the arts agency or administrator choosing methods to implement an information system. There are questions to ask: Should the system be set up to use paper files, punched cards, or one of a variety of mechanical devices available for processing information? Will it include a computer, and if so, will the computer be located in the office or at a service bureau? If at a service bureau, how will data be transferred to the computer? There will also be judgments to make about each of the available options (Which method will supply information needs most effectively? Which represents the wisest financial investment?), and finally, there are the actual decisions to face.

On the following pages we will discuss 1) the resources available to arts agencies gathering information on system options, 2) alternatives for an agency considering an automated system, and 3) factors for an agency to consider when it makes the big decision. Then we will look at how Agencies A, B, and C chose methods for their information systems.

Resources Available

The best resource for a public arts agency to use in exploring information system options is the network of other public arts agencies in the country. Few organizations or businesses have access to so many counterparts with similar problems and activities. Through the National Information Systems Project, which maintains an index of systems proposed and used, ideas and advice are available from every state, jurisdiction, and region. Entries to the index include descriptions of systems developed for a variety of purposes, from mailing list, grants management, and arts resource directory systems to events calendars and word processing. Agencies may consult this index to find out what has or has not worked well elsewhere, and what National Standard computer programs are available to be shared and exchanged. There are examples of good manual and mechanical systems which should be examined and imitated by agencies which do not need computers. And the NISP index can put arts administrators in touch with other people engaged in similar implementation efforts.

Another place to look for system options is within an agency's own community. It is important not to overlook this resource, because when the time to make a decision arrives, the determining factor in what methods are chosen will likely be what is available locally in terms of supplies, equipment, and professional support for the system. Arts administrators should talk to other cultural organizations in their communities and to business acquaintances in both the profit and nonprofit sectors. They should contact business schools and college or university departments which deal with information management. And in each instance, they should inquire about examples of good systems operating locally and ask to be referred to reliable vendors — whether they be management consultants, computer specialists, or companies which design and sell systems. Finally, an agency should not forget about the telephone company's Yellow Pages, for while a business acquaintance's recommendation is far more valuable than a telephone book, an administrator may find it useful to call several data processing firms, discuss their services, and study the literature they send.

Perhaps the resources most widely used by agencies developing information systems are consultants who have the technical expertise to assist agency staff members with the more complex and confusing aspects of implementation. Such a consultant must be chosen with care; he should be familiar with the agency's work and sensitive to its special purposes and constraints. Furthermore, the person or firm selected must be appropriate for the specific task the agency has in mind. For example, will the consultant merely have to examine the agency's system specifications and decide whether or not it needs a computer? Or will he have to help find the computer vendor, select the equipment, get the proper electrical circuits installed, test the system, and train the staff? In either instance, a consultant with general management experience is appropriate, but in the latter case he must also be very familiar with the wide range of hardware, software, and service options available, and have practice implementing systems in small business settings. Likewise, will the consultant merely have to write a program which meets specifications for a mailing list system that works on the computer down the hall? Or will he have to design software for the accounting system, integrate it with an existing payroll system, develop a compatible grants system, write a

procedures manual for the operators, and advise the agency's director on the feasibility of adding a mailing list component next year? Again, while a computer professional with programming experience is needed in each case, the degree of specialization and experience required may vary greatly with the task. Finally, an agency must be prepared for the fact that locating a good data processing consultant may be one of its most difficult tasks. It is rare to find someone who has the interest and willingness to learn what special needs distinguish public and nonprofit agencies from clients in the business world, who is not attempting to sell a particular product, and who offers useful, objective advice.

The usual way for an agency to locate a consultant for the task it has defined is for it to develop an *RFP** (Request for Proposal), that is, a document which describes the agency's needs and formally requests responses from the individuals and companies to whom it is sent. An RFP can be used to solicit bids for virtually everything from developing and installing an in-house computer system to finding someone with the expertise to write another, more technical RFP. An RFP should include sections which:

1. *describe the agency:* what it does, how large it is, what its priorities are;
2. *state the problem:* "We need someone to help us design and implement an information system.";
3. *describe what the consultant will do:* "We need help choosing methods to meet the system requirements we have defined.";
4. *describe what the proposals should include:* the consultant's résumé or company's background, personnel to be involved, proposed course of action (including hardware and software descriptions and maintenance plans, if appropriate, plus timetables and costs), references;
5. *give the rules:* deadline, contact person, address, telephone number, basis of evaluation, decision date, implementation schedule;
6. *explain the attachments:* output, input, and system design specifications (Steps 1 - 3); National Standard field, selection, and report examples (pp.105-167).

The RFP should be sent to individuals and firms which provide the specific services being sought and have expressed interest in the agency's plans. Responses should be evaluated with care — usually consultants are interviewed and references are contacted — and the consultant or company which demonstrates the best understanding of the agency's needs and proposes the best plan to meet them should be selected. Finally, a written contract should establish the terms of the consultancy as solicited in the RFP, proposed in the bid, and agreed upon by both parties.**

Before we conclude this section on resources for arts agencies choosing system methods, we should consider several resources which might be helpful to the administrator whose past experiences have mercifully steered him clear of computers, but who now finds himself tongue-tied and terrified in the presence of consultants, business associates, and, yes, even the Yellow Pages. This book and the references in the Bibliography (p.173) are good places to begin developing a simple vocabulary of the terms and jargon commonly used in the data processing business. Seminars and conferences sponsored by equipment vendors and trade organizations can be informative about both the technical developments in the computer industry and the executive's role in developing and using information systems. And local business schools and community colleges sometimes offer classes and workshops on data processing for non-computer professionals. Finally, the administrator should resolve to seize every opportunity — despite himself — to ask lots of questions.

*_Computers and the Performing Arts_ (see Bibliography, p.173) contains much valuable information on choosing methods for information systems. Of particular interest are Robert E. Butler's section on "Development of an RFP," pp. 36-45, and Claudia Chouinard's "The Request for Proposal" with a sample RFP, two responses, and an analysis of each, pp. 48-56.

**Robert E. Butler's "Negotiating a Contract" on pp. 45-46 of _Computers and the Performing Arts_ (see Bibliography, p.173) gives important details on negotiating contracts for computer system development and installation.

Choose Methods

Automation Alternatives

If an electronic system is an option for an agency developing an information system, the major choice to be made is whether the agency will use someone else's computer (a service bureau), or acquire one of its own (an in-house computer).

A service bureau is a company which supplies computer services to many clients. An agency which is *online* with a service bureau has input and output devices in its office which are used to communicate via telephone or leased lines with the bureau's off-premises computer. Information can be sent to and retrieved from the system right in the agency's office, but the data are stored and manipulated elsewhere. Service bureaus often have pre-packaged computer programs (i.e., programs which have been developed for other clients and are offered without alteration) available for their customers, but may also provide the technical expertise to design custom software. An agency online with a service bureau has the advantage of having direct access to sophisticated equipment and professionally-trained personnel without the responsibility for purchasing, recruiting, or maintenance. The bureau handles maintenance for both the equipment and programs, and is responsible for all back-up procedures (the consistent, regular practice of making copies of all data in a system and storing them in a safe, fireproof place). Furthermore, the agency using a service bureau is able to plan its data processing costs quite accurately: it pays the bureau only for the storage space and computer time it uses, plus a basic fee for services and support; it purchases or leases the equipment in its own office and usually pays a monthly contract for terminal maintenance. The quality of service under such an arrangement will depend upon the quality of the bureau's staff and the capabilities of its equipment and programs. Also significant are the number of other customers connected to the same computer, and whether access to the computer is limited to certain times or is available around the clock. The more customers a single computer has to work for, the less time it can spend on a single customer's work; too many customers can make a computer so busy that it appears to work very slowly for them all.

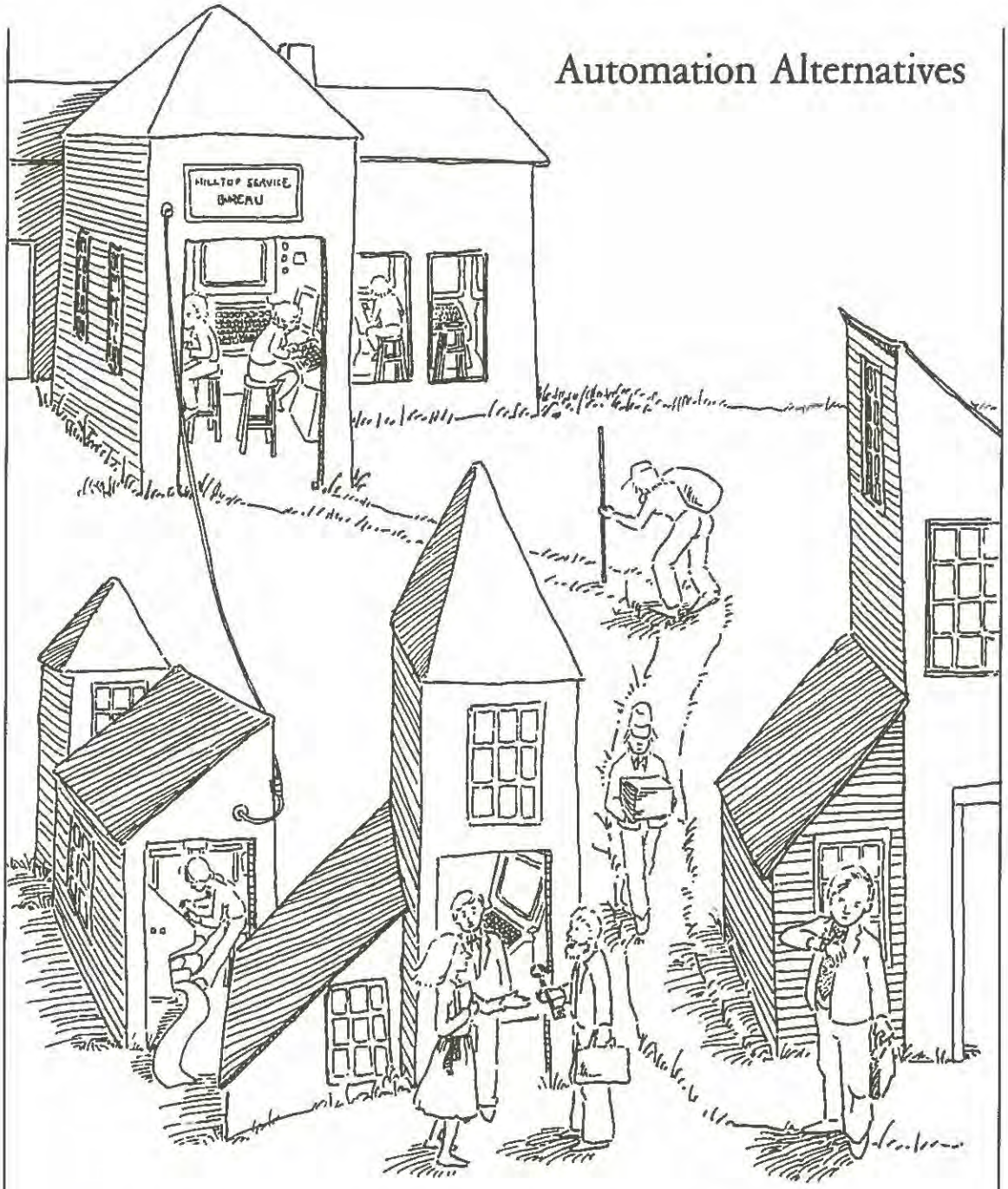
An agency which works with a service bureau on a *batch* basis may also have input and output equipment in its office, but the bureau's computer will handle the information in a different manner. Usually the data entered to the system will not go directly to the computer's processor, but will be saved up in "batches" and processed all at once when the computer has the time — often during non-peak hours. As a result, the agency will not have immediate access to updated information. In a batch service bureau arrangement, it is also common for the customer not to have a terminal at all, but to send the information by mail or have it delivered in person. In such cases, information may be forwarded on copies of original source documents (e.g., invoices, grant application forms, lists of names and addresses) for input by the bureau's staff, or it may first be transferred to special input forms, punched onto computer cards, or put on magnetic tape or diskettes. Costs are outlined on a flat fee or fee-per-transaction basis and are, like online service costs, easy to predict. The quality of service will again depend upon the bureau's staff and equipment, plus the speed with which information can be processed from receipt to report, and the method used for data transfer.

Evaluation of any proposal from a service bureau, whether it is for online or batch data processing, should include careful review of the bureau's customer references, security and back-up provisions, policies on the ownership of custom software, and financial stability. An agency using a service bureau is entrusting outsiders with information essential to its management; that data's safety is an important concern.

When an agency decides to acquire its own computer, it is responsible for obtaining and maintaining all the components of an electronic information system: the computer, input and output devices, computer programs, and personnel to operate them. Hardware and software are leased or purchased from one or a variety of vendors. Software can be pre-packaged, custom-designed according to the agency's specifications, or a combination of both. Service contracts for the equipment and computer programs are usually acquired to provide preventive and necessary maintenance. And depending upon the type of system, those selected to operate it may be computer professionals, specially recruited administrative personnel, or retrained people from the existing staff.

The in-house computer's owner has the advantage of having complete control over the system: access to the equipment, control over data security, and deciding who will operate the system are all at the owner's discretion. In addition, the owner can act as a service bureau and rent portions of the machine to other users. In return for this flexibility, however, the owner assumes responsibilities, problems, and costs never dreamed of by agencies using service bureaus. These include providing a site which meets climate and electrical requirements for the computer, furniture to house the attachments, and overhead costs such as utilities, a security system for the site, supplies, insurance, and cleaning. The in-house system owner must provide documentation for the computer programs and operating instructions for the staff. When the system breaks down, the agency must

Automation Alternatives



determine whether the problem is in the hardware or software, call the appropriate maintenance company, and suffer until service people come and the difficulty is resolved. Furthermore, costs for an in-house system are less easily ascertained than those for a service bureau. While it is simple to determine equipment and maintenance contract prices, budgeting is likely to become vague in areas pertaining to overhead, hiring and training personnel, developing custom software, and providing administrative time and energy to handle the "hassle quotient." (see p.41)

Some computer companies provide "turnkey" systems for their clients. That is, they send personnel into the agency, do a feasibility study, design all system specifications, choose the equipment, develop the software, hire and train all necessary personnel, and finally, when everything has been tested, "turn the key" and transfer to the user a fully operating system. The agency has the advantage of being spared a multitude of problems and decisions associated with installing an in-house system. This may be particularly valuable to a first-time computer user. On the other hand, the agency's administrators may sacrifice the opportunity to work closely with consultants, hardware and software firms, and programmers at various stages of the process. In doing so, they may sacrifice both an invaluable educational experience and the "perfect" system.

Making the Decision

When an agency has finished the business of exploring resources and hiring consultants, soliciting proposals and reviewing alternatives, it is time to make the big decision — to choose from among available options the system methods it will use. As it takes this step, an agency needs to weigh each proposed method against these three factors:

1. performance — how well does the proposed method meet the agency's needs?
2. timeliness — how quickly will the system provide the information required of it and how soon can it be implemented?
3. cost — what will the agency have to pay — now and in the future?

Performance should be measured according to the output requirements determined by the agency in Step 1 and the system design developed in Step 3. If the proposed method meets these specifications, it qualifies as a viable option. An evaluation of performance should also include the method's reliability — references from other users should indicate that the system continues to provide good service on a regular basis. Performance should be evaluated in terms of the system's flexibility for future change — it should be able to expand to meet additional needs without difficult or expensive modification. Finally, performance evaluation should consider the provisions made for protecting information stored and manipulated by the system.

System security deserves more than passing reference. Whenever a lot of valuable information is stored in one place, it is important that it be protected from damage or destruction. Yet there is a tendency in information systems development to give security considerations inadequate attention until the first disaster occurs. Therefore it is essential that any system option an agency selects makes good provision in advance for secure data storage. Valuable paper documents should be kept in a fireproof file if fire is a concern, for example, or in a locked cabinet if unauthorized access is a problem. A computer, of course, cannot be secured in a separate room or cabinet, so it should be equipped with built-in measures which prevent operators from deleting large amounts of information, and passwords which allow only authorized personnel access to certain data and functions. When protection efforts fail, it is important that back-up systems be available to replace stored data. For example, an agency using a computer should regularly (daily or weekly, depending on the volume of updates) copy all information in its system onto tapes, disks, or diskettes. This back-up copy should be stored in a safe place off the premises (e.g., in a bank safety deposit box) in case the computer system is damaged or destroyed.

Timeliness should be measured according to both the output schedule determined in Step 1 and the agency's timetable for implementing the information system. Consider, for example, an agency evaluating a mailing system bid from a computer service bureau. If the agency has decided that it must have a list of all entries once a month, an updated set of labels two weeks later, and special lists with three days' notice, the method proposed should demonstrate the bureau's ability to meet these requirements with ease. It should not rely on the mail, have slow turn-around on updates, or be incapable of handling unscheduled requests. Furthermore, if the agency wants its mailing system to be fully operable within three months, the proposal should indicate how it plans to accomplish the remaining steps in this time. The service bureau should have a good record for meeting deadlines, the project should not depend upon the availability of one person, and it should be clear that other clients' workloads will not interfere with the schedule. If it passes these tests, the proposed system meets the agency's time requirements.

The *cost* of a proposed system should be described in two ways: how much it costs to set up the system initially, and how much it costs to operate it from day to day. Proposed option costs should be compared with each other and with the costs for running the agency's present system. The following, often hidden costs, should not be ignored if they apply to the methods under consideration:

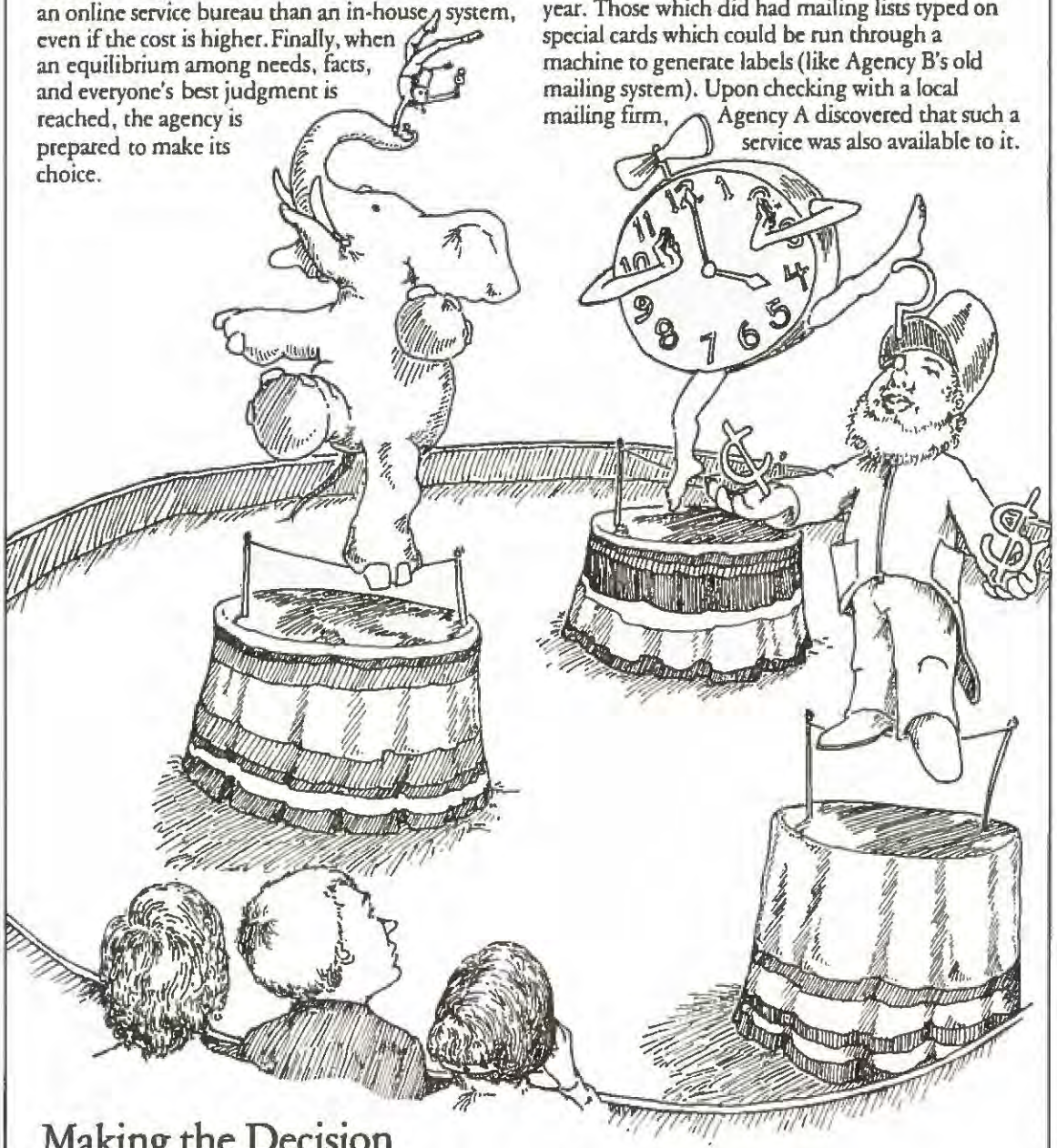
- recruiting and training staff members;
- retraining existing staff members (or, if formal retraining is not necessary, the cost of time spent getting adjusted to new procedures and equipment);
- operating parallel systems (see Step 8, p. 98) and the possible need for additional staff during this period;
- converting information from an old system to the new one;
- designing and printing new forms and documents;
- modifying the office environment, including changes in electrical capacity and the telephone, heating, and cooling systems;
- providing additional furniture, shelves, and storage areas;
- insuring the system and its components.

Choosing methods for an information system will ultimately require delicate balancing of an agency's performance, timeliness, and cost priorities. Sometimes compromises will have to be negotiated: Can we get along with fewer reports to reduce the cost? Will the price be lower if we modify our time requirements? Does the added speed compensate for the unavailable features? Sometimes an agency's preparedness for a particular type of system will be a chief consideration. For example, if an agency has not established a central, manual system that manages its grants effectively, it cannot expect improved performance from even the most creatively designed computer system. An efficient manual system — even temporarily — would be a better choice. Or if an agency has never used a computer before, it may initially be more comfortable with an online service bureau than an in-house system, even if the cost is higher. Finally, when an equilibrium among needs, facts, and everyone's best judgment is reached, the agency is prepared to make its choice.

Agency A

The arts council setting up a *resource directory* of artists had presumed all along that it would end up with a file of cards or a small, loose-leaf notebook. This was a logical conclusion given the small scale and simple requirements of the system. What the agency did not know, however, was that other state arts agencies had found ways to make simple card systems work very effectively for them.

Fortunately, Agency A contacted NISP to ask what other agencies had accomplished using manual information systems. It discovered that several had arts resource directory systems on McBee Keysort cards (see pp. 22-24). Keysort systems presented an easy way to select entries, but few existing card systems had the capacity to generate labels as Agency A hopes to do once a year. Those which did had mailing lists typed on special cards which could be run through a machine to generate labels (like Agency B's old mailing system). Upon checking with a local mailing firm, Agency A discovered that such a service was also available to it.



The agency chose to incorporate the best features of several types of systems in its resource directory. Entries will be typed on mailing cards so that labels can be made very inexpensively without retyping all the addresses. Since the special cards are 3½" x 7½", and since only a small portion of each one is used for the name and address, the rest of the card will be available for the necessary descriptive information. On one side, the agency will punch out holes to indicate the artist's discipline; on the other a second punch will identify the artist's county. References who have sponsored the artist will be listed on the back of the card so that when a written referral confirmation must be sent, the back of the card can be photocopied onto a form, eliminating the need to retype this information. The cards will be filed alphabetically by artist's last name in a special desk-top file box.

Thus a modified mailing/punched card/photocopy resource directory system will serve Agency A's needs splendidly: the cards will simplify the tedious chore of producing a mass mailing, the punched-out-hole approach will allow a person to select the cards by "Discipline" or "County" while handling a telephone inquiry, and photocopying the references will make possible easy distribution of the data needed to confirm artist referrals. And best of all, cost of the system merely involves printing some 3½" x 7½" cards and a questionnaire, the wooden file box, one annual mailing, and a part-time person to maintain the cards, answer the telephone, and mail the responses.

Agency B

Because of the size of its list and the complex selection, sort, and report requirements it has identified, Agency B will computerize its *mailing system*. As is the case with many state agencies, Agency B is required to use its state data processing department if it wishes to acquire computer services of any kind. A professional from the department looked at the arts council's specifications, discussed its budget restrictions with the director, and determined that unless the council had other systems it could justify computerizing (which it does not), an in-house computer for the mailing list would not be cost effective. Instead he suggested that Agency B use the state's data processing department as a service bureau to handle the mailing list on a batch basis. The agency will not have a terminal in its office; instead staff will carry input forms to the computer department across the street and receive reports in like manner.

The major problem Agency B faced was deciding where to obtain a computer program to meet its system specifications. It could write a new program for several thousand dollars, purchase or lease existing software from another state department or state arts agency, or obtain a packaged mailing program from a local computer firm. A check of the NISP index revealed only one arts agency program which could be useful on the state's computer. However it would not be ready for three months and then would have to be modified to include the "Telephone" field. The state university had mailing list software on the same computer, but it could not easily accommodate the National Standard "Mail Code." Finally Agency B discovered that the Department of Motor Vehicles had software available at no charge which could be revised as needed for only $800.

Agency B subsequently hired a computer programmer to modify the Department of Motor Vehicles' program and a keypunch service to transfer the existing mailing list from paper cards to computer-readable tape. Meanwhile, the staff members adapted another arts agency's mail code questionnaire for their own use and sent it to the agency's constituents. A cover letter explained the conversion to the new mailing system and asked everyone to code himself and return the form. As soon as the computer program is ready and the old data are transferred to the new system, the secretary responsible for the list will begin the task of removing duplicates, updating entries, and adding the National Standard codes.

Agency C

When staff members at Agency C completed Steps 1 through 3, they were certain that a computer would be necessary to provide all the requirements of their new *grants management* system. However, they lacked the technical expertise to choose among the many options available. Consequently, the agency released an RFP describing its situation and requesting assistance from a data processing consultant. Of the consultants that submitted proposals, the arts council hired the one who demonstrated her understanding of the arts and the agency's grants management process, and who appeared most familiar with the computer equipment on the market. After several meetings with the staff and a written report to the director, she developed another RFP and sent it to vendors of computer equipment and services. Nine companies received the RFP and four responded with proposals: one for online computer services, three for in-house systems. The vendor chosen had a reputation for successful small business computer installations and proposed a low-cost in-house system with the

ability to do the agency's work for the next seven years without major modifications. The vendor's ability to provide *all* equipment, programs, training, and systems maintenance contributed to the selection decision.

The software being developed for Agency C's small computer will provide a "data base management" system. This means that when the agency's input and output needs change, all of the computer programs will not have to be rewritten. Instead, if additional fields are required, for example, the agency only needs to describe to the computer the fields it wants to collect and the computer will determine how to store them. Furthermore, the data base management features will allow the system's operators to design their own reports, tables, charts, and graphs using data stored in the computer. Thus Agency C will be able to respond to unusual requests for information which were not expected or included in its current system specifications.

An additional feature of Agency C's chosen computer is the ease with which it can be upgraded or improved to meet information needs not even anticipated at this time. For example, if the arts council someday desires to computerize its monthly calendar of arts events or its mailing list and finds that the new system's volume requirements exceed the machine's present capacity, additional memory and storage can be added. The computer also will accommodate several more CRT's and a faster printer than currently planned, and its manufacturer offers an excellent, compatible word processing system. Staff members at Agency C are already dreaming about the day when their computer will type grant award letters, produce labels for bulk mailings, and prepare camera-ready copy for the arts events calendar.

The computer is small enough to be placed in a corner of Agency C's grants office. One CRT will be on the grants officer's desk and another on that of his assistant. The printer will be located in an adjacent storage room where its humming and clicking will not bother people using the telephone. An electrician will have to install a special grounded line to the room before the computer can be hooked up, but the present heating and air-conditioning systems will be adequate even on weekends when thermostats are adjusted by ten degrees.

Step 5: Test New System

Before an agency relies on its new system for correct information, the system must be thoroughly tested for completeness and accuracy. This step is usually conducted in three phases:

- data test,
- unit test, and
- system test.

The purpose of testing a new system is to locate and correct mistakes (called "bugs" in computer parlance) before they have an opportunity to damage valuable data or severely hamper an agency's ability to conduct business. It is important to approach testing with a positive attitude about finding the bugs. They *will* exist, especially in a computer system, and the sooner they are uncovered and eliminated, the sooner the agency will be able to enjoy a good information system.

A *data test* checks the collection and storage of the system's data. If input is to be gathered on questionnaires and other forms, these documents must be tested for clarity and practicality before they are printed and distributed for actual use. Frequently agencies "field test" new forms, that is, they send a draft of the document to a small group of constituents, asking them to answer all the questions and return the draft. This exercise usually reveals which questions and instructions are most often misunderstood, which spaces are too small for the data to be contained in them, and which codes must be better defined. The knowledge and experience gained from the field test are then used to produce a revised document to collect information for the system.

When problems associated with data collection have been resolved, the tester must check the new system's ability to store entries of the required sizes and in stipulated volumes. He will make up a small amount of sample data and enter it into the system to analyze whether the field limits are realistic and whether the system is able to store the data accurately. Then he will try to overload the system with a large amount of sample data to learn whether the allocated storage space accepts the data. A computerized mailing system with space for 6,000 entries of 167 characters apiece can serve as an illustration. The tester will first enter a few sample names and addresses to determine whether each field size allocated is sufficient, and whether the system does indeed permit 30 characters and no more in the "Name" field, 20 characters in the "Address 1" field, and so forth. Then he will stuff the system with 6,000 sample entries (this can be done automatically) to make certain the space is actually there for all that data.

Testing For Bugs

If, for some unexplained reason, the system stops accepting entries after the 4,269th one, it will be discovered at this time. When the system can collect and store data without problems or inaccuracies, it will have passed its data test.

A *unit test* checks the parts of the system which manipulate information. The tester will verify that data can be added to, deleted from, or changed by the system without mishap. Using sample information, he will ask the system to select specific fields and entries according to each of the selection criteria specified in the system design. Similarly, he will make it sort data by all of the sorting requirements while he pays careful attention to whether the names actually appear in alphabetical order, for example, or whether all the 60601's precede the 60602's in a ZIP Code sort. He will check calculations for arithmetical errors, and finally make the system produce printed reports to learn whether all necessary data appear in proper format. When each part of the system manipulates information in the manner intended, the system will have passed its unit test.

During the final *system test*, the data and unit tests will be combined to insure that the various parts of the system work as well together as they do alone. In order to pass the system test, the system must prove that it can store small and large amounts of information, change fields and add or delete entries accurately, and report selected, sorted, and calculated information correctly every time. An automated grants system, for example, might be required to perform all of these functions at once: "Select all the theatre grants in the performing arts program, sort them alphabetically by applicant, and print a list which totals the grants awarded." If the system includes many pieces of equipment, the tester must make certain that each performs its functions individually while all are operating simultaneously. If the unit test indicated that the CRT and printer operate successfully alone, this will be the time to find out that the lights flicker, fuses blow, and the system crashes when they are turned on together. The tester will run the system through its paces in every imaginable way until he can verify that it will do flawlessly exactly what it is told. When this has been done and all the bugs have been found and fixed, the system test will be complete.

Agency A

Testing Agency A's manual *resource directory* system was not difficult. Since the questionnaire used to collect information from artists had been used for six years and revised several times, the staff felt confident that all the bugs were out of it. The woman responsible for artist referrals did a careful data test, however, to make sure all of the information collected would fit on the cards as planned, and that the file box which would store them was both large enough and easily accessible when she was on the telephone. She made sure that the cards fit into her typewriter so the bottom line could be typed, and that the hand punch would notch their edges correctly. Her unit test included a trip to the mailing firm with some sample cards to try on the label-maker, a trial run with the sort needle to line up notched holes and select several cards, and some time with the photocopy machine to satisfy herself that the artists' references reproduce clearly and neatly on a form letter. The system test was simply a confirmation that she could type cards from the questionnaires, select them from the box while on the telephone (it takes a little practice), prepare and send the letters, and return the cards to the file.

Agency B

The arts council setting up a *mailing list* with the state data processing department had a more conventional testing process. Staff members began the data test by using names, addresses, and telephone numbers from two or three pages of the telephone book to fill out a pile of the input forms used by the state computer service. When they were satisfied that the field limits established were realistic (they soon got the knack of abbreviating long names), they brought the forms to the data processing department where experienced operators keyed the information into the machine, tested individual entries, and filled Agency B's storage space to capacity. During the unit test, arts council staff members submitted additions, changes, and deletions, then checked printed edit reports to verify that the data were handled correctly. They tried the individual selections and sorts listed in their system design and had the sample list printed on paper and on Cheshire and adhesive labels. When the computer counted the number of entries in a certain city or with a specific code, Agency B staff people made the same counts by hand and compared the results. Finally, a system test combined updates, selections, sorts, calculations, and reports until staff members were thoroughly convinced that the system would meet their requirements in a timely and accurate manner.

Agency C

Agency C, the owner of an in-house computer *grants management* system, also followed the usual testing procedures. Its new grant application and final report forms were tested by applicants during the grant cycle which preceded installation of the new system. Only when grants office and program staff members were pleased with both the performance and appearance of the documents were they printed in quantity. When conventional data and unit tests had verified the computer's

ability to collect, store, and manipulate data, Agency C proceeded with a unit test of each computer attachment. Both CRT's were used to perform segments of the testing. The ribbon and paper stock in the printer were changed and it was run for a long time to make sure it would not jam. Staff members without passwords tried to access the system until it was clear that built-in security measures were effective. And in one important maneuver, sample data were copied onto back-up diskettes, and the original data were destroyed and reconstructed again using the back-up system. Finally, the back-up diskettes were taken to the bank's safety deposit vault where someone made sure they would fit in the agency's box. When all the bugs located during the data and unit tests had been removed, a system test designed as a miniature grant cycle, with all the people, equipment, and procedures used for the real thing, completed Agency C's testing step.

Step 6: Document New System

The sixth step in implementing an information system is to document the way in which the system is set up and intended to be used. System documentation is accomplished by compiling two manuals:

- a system design book, and
- a runbook.

The step of documenting an information system should begin the first day plans for a system are made and continue after the system is in operation. Such documentation is crucial if the people using the system are going to understand why it exists, how to use it effectively, and how to recognize problems when they occur. Since a properly documented system can be operated, maintained, and revised correctly by people other than those who originally designed and implemented it, good documentation is a system's best insurance against obsolescence.

The *system design book* collects all output, input, and system design specifications in one place, along with detailed descriptions of how the system was planned, how it works, and why it was set up as it was. It includes, for example, the written specifications an agency completed during Steps 1, 2, and 3, including field definitions and copies of all reports developed. If an RFP was used during the implementation process, it should be included in the book along with the selected vendor's proposal and contract. The system design book is for people who will have to modify the system in the future, so it should explain where modifications can and cannot be made. Because changes to a National Standard system must preserve national compatibility, the system design book should make reference to the National Standard and its field, selection, and reporting requirements. In a manual or mechanical system, the system design book will include pictures and descriptions of the cards, files, tools, and machines used to accomplish each task. In a computer system, it will include hardware descriptions and settings; program listings; diagrams of system operations, electrical circuits, and equipment hook-ups; and explanations of security and back-up provisions. The system design book is both a final record of the design steps already taken and a reference book for future decisions.

The *runbook* is an instruction manual for people who will use the system. It describes how to put information into the system and how to produce reports; it specifies who will perform these tasks and when they will do so. It is a detailed procedures manual for the steps needed to make the system do everything it is capable of doing. The runbook for a manual resource directoty system, for example, describes how information will be collected, edited, and input to the system, when it will be updated, how it will be used, and so forth. It traces a typical entry through the system, noting each task performed and each decision made. And every time a special card, index, or machine is involved, the runbook explains how it is to be used. A computer system's runbook is more complicated. In addition to outlining responsibilities and timetables, it must make certain the system's users will know where to find the CRT's switch, how to "sign on" to the mailing system, or what to do when labels get jammed in the printer. For any system, the runbook must provide both regular and occasional users an unobstructed journey to the information they desire.

Agency A

In the agency with a *resource directory* on punched cards, the system design book is a three-ring binder containing all output, input, and system design criteria collected during the planning process. There are also original design layouts for the printed cards and copies of correspondence with NISP, other state arts agencies, the mailing firm, card vendor, and printer. The woman who compiled Agency A's system design book included a list of the pages in the NISP book which discuss arts resource directories, National Standard system components, and specifications for the directory of "Individuals in the Performing and Literary Arts." She tucked a copy of the NISP book itself into the binder's cover pocket.

Document New System

Agency A's runbook is a simple procedures folder describing how to type and file cards, work the hand punch and sorting needle, handle telephone inquiries, prepare and send written referrals, and ship cards to the mailing firm. Also included are the questionnaire, a list of field definitions, and National Standard abbreviations (for easy reference by the person who will type the cards). The woman who wrote the runbook was careful to make it as detailed as possible; her imminent retirement is the reason for this new system and her successor may have to make frequent runbook referrals.

Agency B

The arts council with a computerized *mailing list* system has a copy of the system design book developed by its programmer and the state data processing department. It describes the software and its capabilities, the computer and its storage media, and the security and back-up provisions for Agency B's data. It does not include technical details and diagrams relating to the hardware, for that information is irrelevant to Agency B as a service bureau client. With its system design book, Agency B keeps the specifications it developed during Steps 1 - 3, the National Standard, and correspondence with the data processing department staff, the Department of Motor Vehicles, and the programmer.

The state data processing department also helped Agency B compile a runbook. It includes a sample input form with directions for filling it out properly, and simple instructions for delivering input forms and requesting lists and labels. An "Important Names and Numbers" list gives Agency B's "client number" (to be used on all input forms and orders), and the names and telephone numbers of people to contact with questions. Staff members included copies of the mailing questionnaire, National Standard definitions and abbreviations, and an update schedule.

Agency C

The agency with an in-house computer *grants management* system has a small library of system design books describing the computer and its programs and attachments. These books arrived with the computer and caused considerable consternation among staff members until the consultant assured everyone that most of them were reference materials for the people who will provide system maintenance. She insisted that several new shelves were all that would be necessary. More useful to Agency C, however, are the binders containing its own specifications for the system, the two RFP's and accepted proposals, the National Standard, purchase order and maintenance agreement copies, and logsheets describing all service calls and system modifications.

Agency C's runbook also takes a lot of shelf space. First there are notebooks describing how to use and care for each piece of equipment. The staff members laughed about the fifteen pages of pictures and instructions devoted to changing the printer's ribbon — until they tried it themselves. Second, there is a manual with instructions for operating the data base management system: how to input and store data, how to generate reports, and how to redefine field requirements. Then the agency has a notebook which describes its grants management process in detail and includes copies of all forms, reports, and other pertinent documents. Finally, there are two folders (some say they should be chained to the CRT's) containing all of the system's fields, definitions, codes, and standard abbreviations.

Step 7: Train Users

When an agency has completed testing and documenting its new information system, it is time to train those who will operate the system and use the data it provides. Training users involves teaching them how the system works and how to use it to obtain the information they desire. It is the step of transferring from theory to practice and experience the information contained in the system's documentation.

While documentation should be clear enough to describe the concepts behind the system's design and detailed enough to provide a step-by-step tour of its workings, an administrator implementing an information system should never assume that good documentation can substitute for training. Rather, he should use the system design and runbook as textbooks which accompany comprehensive, practical education on use of the system. Furthermore, an agency should not assume that training is only for a system's operators — the secretary who fills out input forms, the bookkeeper who types transactions into a terminal, or the data processing manager who runs the computer. All of the people whose jobs will be affected by the new system and who will benefit from its implementation — from the board and executive director down — should understand what the system can and cannot do. A good system is an information resource for the entire agency; unless it is understood as such, it will not be used effectively. Finally, training is not something which occurs for a day or two and then is over. As the system is used for processing real data, as problems develop, questions are

answered, and changes are made, both operators and users must continue learning to understand and exploit their new information processing capabilities.

Training is usually conducted by the administrators responsible for implementing the new system with assistance from consultants, equipment manufacturers, system vendors, or service bureau personnel. It should cover both the background and purpose of the system, and the practical concerns of the staff involved. For example, the people responsible for developing and running an agency's grant programs should understand what reports a computerized grants management system can provide and on what basis. It should be clear how they can request unscheduled reports from the system and who will be able to answer their questions about what is and is not possible. If the new system is treated as the mysterious, inaccessible domain of the grants office staff, it will be useless to the agency as a whole.

Operators of the same grants system, on the other hand, must understand it in greater detail. In addition to comprehending the paper, people, responsibilities, and timetables involved in the grant process, they must be familiar with how to use the system's features and operate its equipment every day. When grant applications arrive, they must know how to enter pertinent data to the system, store it properly, and confirm its accuracy. When a report is requested by the program staff or panels, they must be able to translate that request into a format the computer will understand. And when something goes wrong with the system, they must be prepared to react intelligently in order to minimize damage and obtain appropriate help. Consequently, their training will have a different focus from that of their colleagues, whose major contact with the system will be using the data it provides.

Agency A

Training the users of Agency A's new *resource directory* system was done in two steps: there was orientation first for the man hired to replace the person retiring, then for the entire staff. During the new employee's introduction to the directory, he and the woman he is replacing reviewed every page of the system design book and runbook. They concentrated on how and why the agency chose the system specifications and methods described there, and the exact work flow for handling resource directory cards, referrals, and correspondence. Then together they practiced the system's procedures in sequence until the new staff person was comfortable with them all. Because the directory's information on artists is of use and interest to others at Agency A, the new person described the system to his colleagues at a staff meeting. He showed them the cards and file box, demonstrated how the cards are punched to facilitate selection, and answered their questions about how he will use the new system to make artist referrals.

Train Users

Agency B

The agency implementing a computerized *mailing list* sent two people to a one-day workshop sponsored by the state data processing department for government agency personnel using its computer services. One was the secretary who will be responsible for updating the mailing list and requesting labels. The other will be her back-up during vacations and illnesses. A thorough knowledge of the system design book and runbook was a prerequisite for the training session, so both persons studied these documents in advance. During the workshop, data processing department staff members gave a simple explanation of how their computers work, conducted a tour of the department, and introduced everyone to the people who will take requests and process data. Finally, everyone practiced completing input forms and filling out report requests.

Several days later these two people held a short conference with the rest of Agency B's staff to explain the new mailing system's features and to demonstrate the data processing department's services. They had sample input forms, lists, and labels for everyone to see. The arts council's director made it clear that when the new system is fully operable, no one will maintain personal mailing lists on photocopy masters; for all but the smallest mailings, the computer will provide up-to-date, ZIP Code-sorted labels.

Agency C

At Agency C there were also people being trained to operate and use the in-house computer *grants management* system. However, unlike Agency B staff members, they enjoyed the plush setting of their computer manufacturer's educational facility rather than the conference room of another state office building. The grants officer, his assistant, the executive director, and the public information officer spent two days studying basic computer concepts, data processing technology, and the management of a small business system. Grants office staff members remained an extra day to learn about using and caring for their system's hardware. When they returned to the office, the vendor who had sold Agency C its system and installed the software spent three days going through the runbook with them. He helped them practice entering and retrieving data, designing special reports and tables, and running back-up diskettes. After a week of instructions and practice, both the grants officer and his assistant were very adept at handling the new equipment in their office.

When they were confident they could operate the system, the grants office staff members conducted a day-long seminar for the rest of the staff and interested panel and Council members. They demonstrated the computer, described its capabilities, and answered questions about its use. Finally Agency C scheduled a six-month series of half-day staff workshops, each to deal with some aspect of grants information management as it relates to the new computer. Topics for the workshops include using stored data to do program evaluation, utilizing the special data base management features, preparing the next annual report, analyzing and improving data input documents, and, eventually, evaluating how successfully the system meets Agency C's information needs.

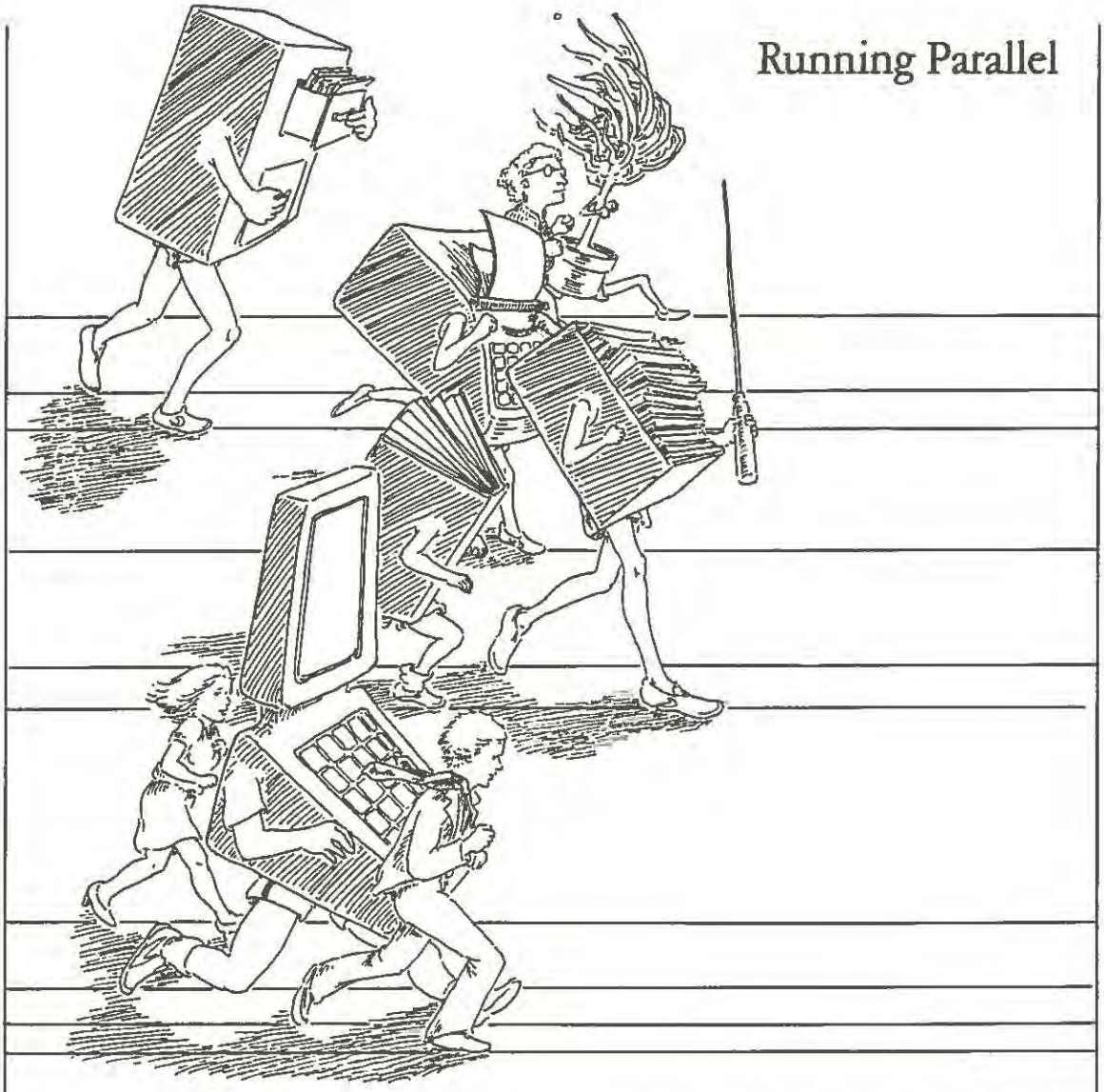
Step 8: Operate Parallel Systems

After a new information system has been installed, tested, and declared ready for use, it must be operated simultaneously with the old system until it is clearly capable of assuming its tasks alone. This step is called "running parallel" or "operating parallel systems."

In a sense the parallel period is an extension of the system test performed earlier, except that now real or "live" data are entered to the system and used regularly for several weeks or months. During this time an agency begins to rely upon its new system in earnest, but it also scrupulously updates the information in its old system — just in case. Running parallel should continue until the agency is convinced that the new system performs according to its objectives within the day-to-day work environment.

To help us understand the importance of operating parallel systems, let us imagine that MasterCard, a major credit card company, is implementing a new bookkeeping system. In order to keep its customers and make a profit, MasterCard must record and report accurately thousands of transactions involving its account holders, their purchases and payments, and participating retailers. The new system will be planned and tested with utmost care, but when it is ready, MasterCard will operate both the old and new systems simultaneously for several months. It wants to be certain the new system is capable of handling transactions as well as or better than the former system could. The time and money invested in operating the parallel systems will be enormous; every transaction must be recorded twice. Yet the alternative — the new system broken down without the old one to back it up — could put MasterCard out of business.

Running Parallel



Although the situation is probably less critical in most public arts agencies, running parallel is nonetheless important if an agency is going to retain its ability to handle essential information during a time of transition. Consider an arts agency which has been processing hundreds of grant applications by hand for years. Every six weeks, after an advisory committee makes grant awards, the staff fills out ledgers to record funds committed and a huge calendar to indicate when each grant check should be sent and when final reports will be due. Now a newly-installed computer will handle grants management and, to everyone's delight, will replace these two tedious chores. When a "Grant Award" is entered into the system, the computer will automatically add that amount to the funds encumbered, indicate that a check must be sent thirty days before the project's "Start Date," and note that a final report will be due thirty days after the project's "End Date." Regular printouts will show balances remaining in each funding category, checks to be prepared each week, and reports to be expected each month.

Since the agency has a small staff and limited funds for temporary help, and since testing the new system proceeded without a flaw, the agency decides to skip the parallel period. Staff members transfer all of the current application records to the computer, discard the old ledgers and calendars, and faithfully input all new grant data to the system. Things go well until the first printout is needed and the computer is inexplicably unable to perform necessary functions and print a report. Finally, during service on the system's software, the information in about one hundred "Grant Award" fields is accidentally deleted. Eventually the programmer will fix the problem and the back-up system will restore the lost data, but in the meantime the grants process is paralyzed. The advisory committee meeting this week has no idea how much money it can spend, the fiscal officer cannot prepare checks for grantees expecting their money, and no one knows who should be contacted about overdue reports.

When an agency has operated parallel systems for a time without encountering major difficulties, it should review the new system's performance. Has it been reliable for a reasonable period of time (e.g., through an entire grant cycle, a couple of major mailings, or two or three monthly accounting periods)? Does it meet the agency's objectives? Can it provide the selections, sorts, calculations, and reports required of it? Does it do so on schedule? Are operating costs within the budget? Are staff members properly trained and comfortable using it? If the new system was well designed and implemented, and if regular use has located the rest of the bugs, it is ready to stand on its own.

Agency A

The arts council implementing a *resource directory* system has relied for years on the knowledge of a single staff member who was able to make artist referrals from previous experience and familiarity with the arts community. She helped plan and implement the new system, supervised the most recent questionnaire survey, and typed all the new cards from the returns. Now she and her replacement are working together for a month before she retires. The new staff person is responsible for handling the referrals during this period, but in the event that the new system is initially slow or confusing, his predecessor is available to step in and take a call.

Agency B

Agency B hired a keypunch service to transfer its old *mailing list* from cards to magnetic tape. The tape was used to run the old data into the state's computer. When this had been accomplished, the staff did not throw the old cards away, but took them back to the office where the secretary is updating and filing them as she completes input forms for the list now on computer. Thus, if the state service bureau encounters serious problems with the new system, the old cards will still be available for mailing. Agency B plans to run parallel systems in this manner until the computer has completed two successful newsletter mailings.

Agency C

Since Agency C processes grant applications on a quarterly basis, it decided that three months would be a logical parallel period for its old manual and new computer *grants management* systems. So a clerk was assigned to the grants office during this cycle to assist the two people there with their double work. When applications are received, they are noted on the old cards and logsheets as well as entered into the computer. When panel summary reports are produced by the system, they are compared with drafts prepared manually. Reports on encumbered funds are balanced with the old ledgers, and computer grant reports for legislators are compared with lists developed by hand. If three months of parallel running show that the computer is successfully providing Agency C's grant information requirements, most manual procedures will be stopped. But the old calendar will be retained several more months until the computer demonstrates its ability to track the applications first entered into the new system all the way to their final reports.

Step 9: Discontinue Previous System

The last step in implementing a new information system is to discontinue the previous system. When a period of operating parallel systems has demonstrated a new system which is well planned, designed, and tested, and when the staff is adept at its new responsibilities and the agency's information needs are being met, the old system is stopped.

Agency A

At the arts council which now has a *resource directory* system to handle artist referrals, there will be a party for the woman who is retiring. Champagne will be served.

Agency B

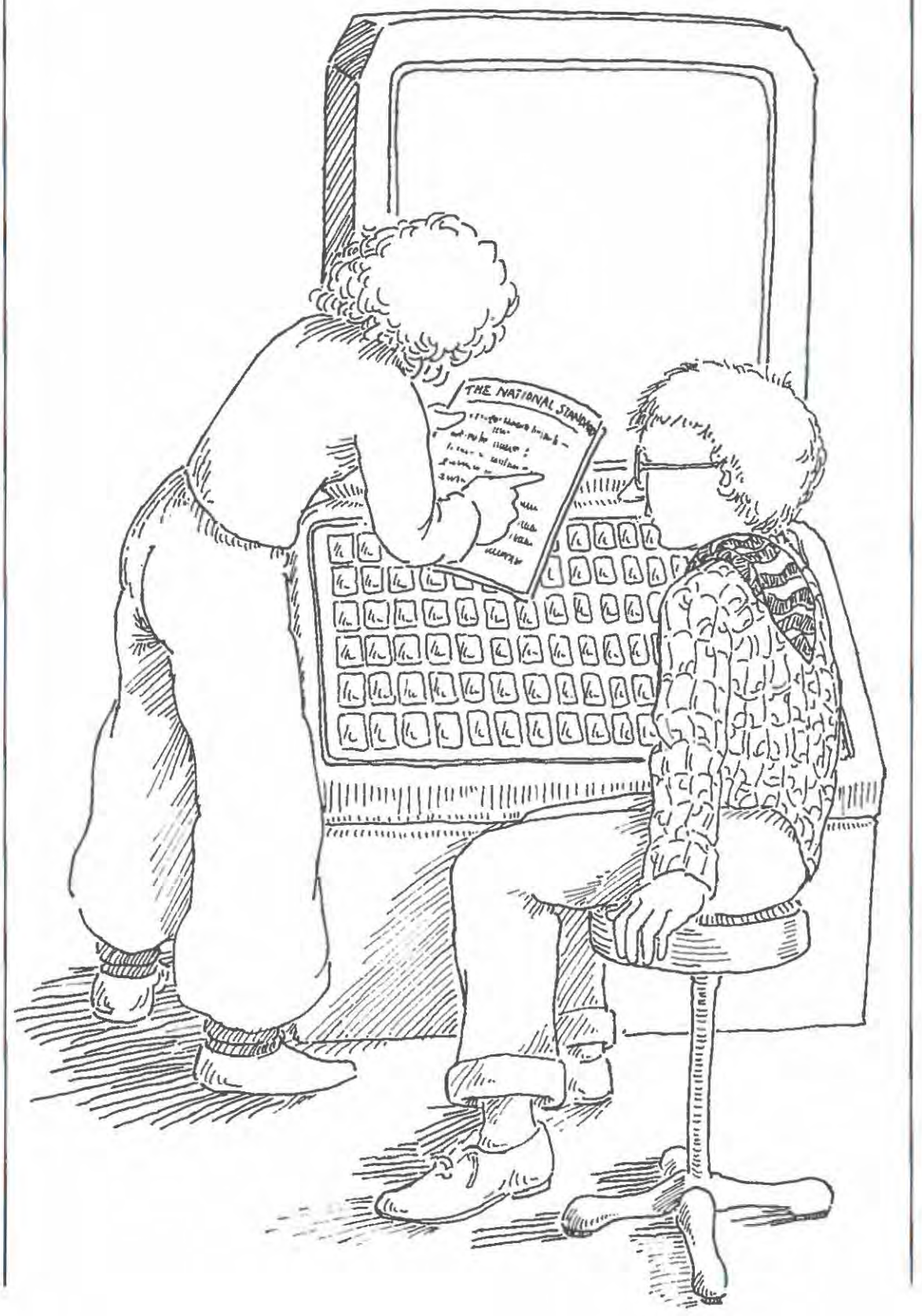
There will be no champagne on the job at the agency using a *mailing list* with the state's data processing department — so it goes when you deal with a government bureaucracy. But the old mailing list cards have now shown up as scratch paper on people's desks. And they make nice bookmarks.

Agency C

Agency C's in-house computer *grants management* system should have been christened with a bottle of champagne, but the runbook recommends against it. Instead the old cards and logsheets will be sent to the National Endowment for the Arts with the agency's block grant report. In triplicate.

Discontinue Previous System

Part II


THE NATIONAL

National Standard for Arts Information Exchange

The National Standard for Arts Information Exchange was developed during 1979 and 1980 by the National Information Systems Project to serve as a rule for basic information systems in American public arts agencies. It consists of terms, definitions, and reporting requirements for use in mailing list, grants management, and arts resource directory systems. It was developed to provide arts agencies with some of the system design work needed for better information management, and to guarantee national compatibility in the collection, organization, and exchange of arts information. The National Standard represents the cooperative work of many agencies in establishing a vocabulary for information systems, and when it is implemented by them, will provide a basis for meaningful use and analysis of data about public arts activities in the United States.

The National Standard system components are printed together here for the first time. This publication replaces and makes obsolete the following NISP documents: *Preliminary Report of the National Information Systems Project*, January 1, 1980 (second printing — May, 1980); "Selections," February 1, 1980; and "Reports," May 16, 1980. Revisions and editorial changes — usually field size amendments and definition clarifications — are incorporated here. Therefore, arts agencies using previous editions of the Standard should review all applicable systems and make the appropriate changes on their forms and questionnaires, in system documentation, and in agency use of the National Standard system components.

A detailed explanation of the National Standard for Arts Information Exchange is provided in Chapter III (p.43); guidelines relevant to electronic system development are in the Programming Notes (p.169). Since an understanding of the nature and use of each system and its components is essential to proper system implementation, Chapter III and the Programming Notes are considered integral parts of the National Standard and should be used in conjunction with the material on the following pages.

Contents of the National Standard

Constituent List

Fields

Label	Type Required	Need	Possible Field Size
1. Name (organization or individual)	Text	Necessary	30
2. Address 1	Text	Necessary	20
3. Address 2	Text	Necessary	20
4. City	Text	Necessary	16
5. State	Text	Necessary	2
6. ZIP Code	Numeric	Necessary	10

Definitions

1. **Name (organization or individual)**
   The name of the constituent, either organization or individual. Generally this is the name under which applications are accepted and/or checks issued. It is the identity of the constituent in all information systems. If a list of all constituents were to be compiled, this is how the constituent would appear. If abbreviations are necessary or desired, use "Abbreviations" on pp.108-111.
2. **Address 1**
   First address line. Never enter an organization name here unless it is a necessary part of the address — it should go under "Name (organization or individual)." Box numbers, street addresses, departments, or c/o notes are acceptable. If abbreviations are necessary or desired, use "Abbreviations" on pp.108-111.
3. **Address 2**
   Second address line. Same definition as "Address 1."
4. **City**
   Post office address. For foreign mail (non-United States and territories), include state / province abbreviation and country.
5. **State**
   Two-character state abbreviation. See "Abbreviations" on p.108.
6. **ZIP Code**
   United States Post Office ZIP Code.

Abbreviations

States and United States Territories*

Alabama	AL
Alaska	AK
American Samoa	AS
Arizona	AZ
Arkansas	AR
California	CA
Canal Zone	CZ
Colorado	CO
Connecticut	CT
Delaware	DE
District of Columbia	DC
Florida	FL
Georgia	GA
Guam	GU
Hawaii	HI
Idaho	ID
Illinois	IL
Indiana	IN
Iowa	IA
Kansas	KS
Kentucky	KY
Louisiana	LA
Maine	ME
Maryland	MD
Massachusetts	MA
Michigan	MI
Minnesota	MN
Mississippi	MS
Missouri	MO
Montana	MT
Nebraska	NE
Nevada	NV
New Hampshire	NH
New Jersey	NJ
New Mexico	NM
New York	NY
North Carolina	NC
North Dakota	ND
Northern Mariana Islands	CM
Ohio	OH
Oklahoma	OK
Oregon	OR
Pennsylvania	PA
Puerto Rico	PR
Rhode Island	RI
South Carolina	SC
South Dakota	SD
Tennessee	TN
Texas	TX
Trust Territories	TT
Utah	UT
Vermont	VT
Virginia	VA
Virgin Islands	VI
Washington	WA
West Virginia	WV
Wisconsin	WI
Wyoming	WY

Canadian Provinces and Territories

Alberta	AB
British Columbia	BC
Labrador	LB
Manitoba	MB
New Brunswick	NB
Newfoundland	NF
Northwest Territories	NT
Nova Scotia	NS
Ontario	ON
Prince Edward Island	PE
Quebec	PQ
Saskatchewan	SK
Yukon Territoty	YT

*United States Postal Service, Customer Services Dept., Notice 23-B / OCT. 1976

General

Academy	ACAD
Acting	ACT
Addition	ADDN
Administration	ADMIN
Administrative	ADMIN
Administrator	ADMIN
Advisory	ADVS
Advocate	ADVC
Affiliated	AFF
Affiliates	AFF
Afro-American	AFRO-AMER
Agency	AGCY
Air Force Base	AFB
Airport	ARPT
Alley	ALY
Alliance	ALNC
Alternative	ALT
American	AMER
American Indian	AMER IND
And	&
Annex	ANX
Anthropological	ANTHR
Anthropology	ANTHR
Apartment	APT
Aquarium	AQR
Arcade	ARC
Architectural	ARCHL
Architecture	ARCH
Archive	ARCV
Arsenal	ARSL
Artists-in-Schools	AIS
Assembly	ASSY
Assistance	ASST
Assistant	ASST
Associate	ASSOC
Associated	ASSOC
Associates	ASSOC
Association	ASSN
Attorney	ATTY
Audience	AUD
Audio	AUD
Audio-visual	A-V
Auditorium	AUD
Avenue	AVE
Bayou	BYU
Beach	BCH
Bend	BND
Black	BLK
Bluff	BLF
Botanic	BOT
Botanical	BOT
Boulevard	BLVD
Branch	BR
Bridge	BRG
British	BRIT
Broadcasting	BRDCSTG
Brook	BRK
Brother	BRO
Building	BLDG
Bureau	BUR
Business	BUS
Business Manager	BUS MGR
Bypass	BYP
Canadian	CANAD
Canyon	CYN
Cape	CPE
Care of	C/O
Causeway	CSWY
Center, Centre	CTR
Central	CTL
Chairman	CHRM
Chapter	CHAP
Children's	CHLDS
Chinese	CHIN
Church	CHR
Circle	CIR
Citizen	CIT
Clearinghouse	CLRGHS
Cliff	CLF
Club	CLB
Coalition	COAL
Collaboration	COLLAB
Collaborative	COLLAB
Collection	CLCT
Collective	CLCT
College	COLL
Colloquium	CLQM
Colonel	COL
Colony	COL
Commander	CDR
Commission	COMM
Committee	COMM
Communication	COMM
Community	COMM
Company	CO
Composer	COMP
Concert	CNCT
Conference	CONF
Conservation	CONS
Conservatory	CONS
Consortium	CNSRT
Construction	CONST
Contemporary	CONT
Contractors	CONTR
Cooperative	COOP
Coordinating	COORD
Coordinator	COORD
Corner	COR
Corporate	CORP
Corporation	CORP
Council	CNCL
Country	CNTRY
County	CO
Court	CT
Cove	CV
Crafts	CRFT
Creative	CREA
Creek	CRK
Crescent	CRES
Crossing	XING
Cultural	CULT
Culture	CULT
Dance	DNC
Decentralization	DECEN
Department	DEPT
Depot	DPO
Development	DEV
Director	DIR
Distribution	DIST
Distributors	DISTRS
District	DIST
Division	DIV
Doctor	DR
Documentary	DOC
Dramatic	DRAM
Dramatists	DRAM
Drive	DR
East	E
Eastern	E
Education	EDUC
Educational	EDUC
Elementary	ELEM
Endowment	ENDOW
Ensemble	ENSBL
Enterprise	ENT
Entertainment	ENTR
Environment	ENVRN
Environmental	ENVRN
Equipment	EQUIP
Equity	EQTY
Estate	EST
Ethnic	ETH
European	EURO
Exchange	EXCH
Executive	EXEC
Executive Director	EXEC DIR
Exhibition	EXHB
Expansion	EXPAN
Experimental	EXPER
Expressway	EXPY
Extended	EXT
Extension	EXT

Falls	FLS
Farms	FRMS
Federal	FED
Federation	FED
Fellowship	FLSHP
Ferry	FRY
Festival	FEST
Field	FLD
Film	FLM
Filmmaker	FLMKR
Flats	FLT
Floor	FLR
Folk	FLK
Folklore	FLKLR
Forest	FRST
Forge	FRG
Fork	FRK
Fort	FT
Foundation	FNDN
Fountain	FTN
Freeway	FWY
French	FR
Fund	FND
Gallery	GALL
Gardens	GDNS
Gateway	GTWY
Genealogical	GENAL
General Delivery	GEN DEL
German	GER
Government	GOVT
Greek	GR
Group	GRP
Grove	GRV
Guild	GLD
Harbor	HBR
Haven	HVN
Heights	HTS
Heritage	HERT
High School	H S
Highlands	HLNDS
Highway	HWY
Hills	HLS
Hispanic	HISP
Historic	HIST
Historical	HIST
History	HIST
Home	HM
Honorable	HON
Horticultural	HORT
Hospital	HOSP
House	HSE
Humanities	HUM
Improvisational	IMPROV
Incorporated	INC
Independent	IND
Indian	IND
Industrial	INDL
Information	INFO
Institute	INST
Institution	INST
Insurance	INS
Interarts	INTARTS
Interdisciplinary	INTDIS
Intermedia	INTMED
International	INTL
Interstate	I
Involvement	INVL
Island	ISL
Italian	IT
Japanese	JAPAN
Journal	JOUR
Junction	JCT
Junior	JR
Junior High School	JR H S
Knolls	KNLS
Laboratory	LAB
Lake	LK
Landing	LNDG
Landmark	LNDMK
Lane	LN
League	LG
Library	LIB
Lieutenant	LT
Limited	LTD
Literary	LIT
Literature	LIT
Little	LTL
Lodge	LDG
Lower	LWR
Major	MAJ
Management	MGMT
Manager	MGR
Manor	MNR
Manufacturing	MFG
Market	MKT
Marketing	MKTG
Meadows	MDWS
Media	MED
Meeting	MTG
Memorial	MEM
Metropolitan	MET
Mexican	MEX
Middle	MDL
Mills	MLS
Mission	MSN
Mobile	MBL
Mount	MT
Mountain	MTN
Mounted Route	MTN RT
Multi-media	MULT-MED
Municipal	MUN
Museum	MUS
Musical	MSCL
National	NATL
Native American	NTV AMER
Neighborhood	NGHBR
Network	NTWK
North	N
Northeast	NE
Northeastern	NE
Northern	N
Northwest	NW
Northwestern	NW
Number	#
Office	OFF
Officer	OFF
Opera	OP
Orchestra	ORCH
Organization	ORG
Park	PK
Parkway	PKWY
Participation	PART
Performance	PERF
Performing	PERF
Philanthropic	PHIL
Philharmonic	PHIL
Photographer	PHOTG
Photography	PHOTG
Place	PL
Plains	PLNS
Planetarium	PLNT
Players	PLYRS
Playwright	PLWRT
Plaza	PLZ
Point	PT
Port	PT
Post Office	PO
Preservation	PRES
President	PRES
Producer	PROD
Production	PROD
Professional	PROF
Program	PROG
Project	PROJ
Promotion	PROMO
Public	PUB
Public Relations	P R
Publication	PUBL
Puppet	PUPT
Ranch	RNCH
Rapids	RPDS
Recreation	REC
Reference	REF
Regional	REG
Registry	RGSTY
Repertory	REP
Resident	RES
Resource	RSRC
Restoration	REST
Reverend	REV

Ridge	RDG
River	RVR
Road	RD
Room	RM
Route	RT
Rural Free Delivery	RFD
Rural Route	RR
Saint	ST
Scandinavian	SCAND
School	SCH
Science	SCI
Sculptor	SCLPT
Sculpture	SCLPT
Secretary	SECY
Section	SEC
Seminar	SEM
Seminary	SEM
Senior	SR
Senior Citizens	SR CIT
Service	SRV
Shore	SHR
Sister	SR
Society	SOC
South	S
Southeast	SE
Southeastern	SE
Southern	S
Southwest	SW
Southwestern	SW
Space	SP
Spanish	SP
Spring	SPG
Square	SQ
Station	STA
Street	ST
Studio	STU
Subdivision	SUBDIV
Suite	STE
Support	SPT
Symphony	SYMPH
Technical	TECH
Technology	TECH
Television	TV
Terrace	TER
Textile	TXTL
Theater, Theatre	THTR
Theatrical	THTR
Tower	TWR
Township	TWP
Traditional	TRAD
Trail	TR
Trailer Park	TR PK
Training	TRNG
Transportation	TRANS
Traveling	TRAV
Treasurer	TREA
Tunnel	TUNL
Turnpike	TPKE
University	UNIV
Upper	UPR
Valley	VLY
Veterans	VET
Viaduct	VIA
Vice-Chairman	V-CHRM
Vice-President	V-PRES
Video	VID
View	VW
Village	VLG
Visual	VIS
Volunteer	VOL
West	W
Western	W
Women's	WMN
Workshop	WKSHP
Writer	WRT
Yard	YD
Youth	YTH
Zoological	ZOOL
Zoology	ZOOL

Mailing List System

Fields

Label	Type Required	Need	Possible Field Size
1. Contact Person	Text	Optional	20
2. Contact Person Title	Text	Optional	20
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
3. Mail Code	Numeric	Necessary	41

Definitions

1. **Contact Person**
   The person to contact for additional information about "Name (organization or individual)" if that field is an organization. If that field is an individual, no contact person should be listed.

2. **Contact Person Title**
   The official title of "Contact Person."

Include one Constituent as defined in the Constituent List.

3. **Mail Code**
   A descriptor designed to enable an agency to select particular groups of constituents for specific kinds of mail. The following code will be used:

TARGET: Choose the *one* item in *each* column which best describes the constituent.

STATUS

01 Individual
02 Organization - Nonprofit
03 Organization - Profit
04 Government - Federal
05 Government - State
06 Government - Regional
07 Government - County
08 Government - Municipal
09 None of the above

FUNCTION

01 Artist / Producer
02 Sponsor or Presentor
03 Arts Service / Advocacy
04 Humanities Service / Advocacy
05 Education
06 Funding
07 Media
08 Interested in the Arts
09 None of the above

INSTITUTION

01 Individual - Artist
02 Individual - Non-artist
03 Performing Group
04 Performing Group - College / University
05 Performing Group - Community
06 Performing Group - Youth
07 Performance Facility
08 Museum - Art
09 Museum - Other
10 Gallery / Exhibition Space
11 Cinema
12 Small Press
13 Literary Magazine
14 Fair / Festival
15 Arts Center
16 Arts Council / Agency
17 Arts Service Organization
18 Union / Professional Association
19 School District
20 School - Parent-Teacher Association
21 School - Elementary
22 School - Middle
23 School - Secondary
24 School - Vocational / Technical
25 School - Other
26 College / University
27 Library
28 Historical Society / Commission
29 Humanities Council / Agency
30 Foundation
31 Corporation / Business
32 Community Service Organization
33 Correctional Institution
34 Health Care Facility
35 Religious Organization
36 Senior Citizens' Center
37 Parks and Recreation
38 Government - Executive
39 Government - Judicial
40 Government - Legislative (House)
41 Government - Legislative (Senate)
42 Media - Periodical
43 Media - Daily Newspaper
44 Media - Weekly Newspaper
45 Media - Radio
46 Media - Television
47 None of the above

DISCIPLINE

01 Dance
- A ballet*
- B ethnic / folk / jazz*
- C modern*

02 Music
- A band*
- B chamber*
- C choral*
- D contemporary*
- E ethnic / folk*
- F jazz*
- G popular*
- H solo / recital*
- I symphonic*

03 Opera
04 Theatre
- A theatre - general*
- B mime*
- C musical theatre*
- D puppet*
- E theatre for young audiences*

05 Visual Arts
- A conceptual art*
- B graphics*
- C inter-media*
- D painting*
- E performance art*
- F sculpture*

06 Architecture / Design
07 Crafts
08 Photography
09 Media Arts
- A film*
- B radio*
- C television*
- D video*

10 Literature
11 Community Arts
12 Folk Arts
13 Humanities
14 Multi-disciplinary
15 Non-arts / Non-humanities

CONTENT: Choose *all* items which describe what kind of mail the constituent should receive.

01 Dance
02 Music
03 Opera
04 Theatre
05 Visual Arts
06 Architecture / Design
07 Crafts
08 Photography
09 Media Arts
10 Literature
11 Community Arts
12 Folk Arts
13 Humanities
14 Multi-disciplinary
15 Arts Advocacy / Service
16 Arts Management
17 Disabled / Handicapped
18 Ethnic / Minority
19 Senior Citizens

20 Newsletter**
21 Press Releases**
22 Program Information**
23 Board / Council Material**
24 Panel Material**
etc.

* Optional
** Example; actual items to be determined by each agency using the code.

"Mail Code" Definitions

The following definitions are to be used by staff people administering the Mailing List System. They are intended to clarify items of information so that they are discrete. It is important to know whether the person filling out a request for mail is doing so on his own behalf or on behalf of an organization he is representing. In some instances, it might be advisable for a person to fill out two requests — one as an individual and one as a representative of an organization. Whenever more than one item in a column describes the constituent, the item *most appropriate for mailing purposes* should be chosen.

"TARGET" — describes *who* the constituent is

STATUS — describes the constituent's legal status

01 **Individual** - a person, not an organization, as mail recipient

02 **Organization - Nonprofit** - not engaged in profit-making activities (i.e., no part of the income or assets inure to the benefit of any director, officer, or employee except as salary or reasonable compensation for services and travel expenses)

03 **Organization - Profit** - engaged in profit-making activities (i.e., income or assets do inure to the benefit of directors, officers, employees, or stockholders)

04 **Government - Federal** - to be used when the mail recipient is a unit of the federal government

05 **Government - State** - to be used when the mail recipient is a unit of the state government

06 **Government - Regional** - to be used when the mail recipient is a unit of sub-state regional government

07 **Government - County** - to be used when the mail recipient is a unit of county government

08 **Government - Municipal** - to be used when the mail recipient is a unit of municipal government

09 **None of the above** - use only to designate an entry which *cannot* be coded; to leave an entry unclassified, use "00"

FUNCTION — describes the constituent's primary purpose in the arts

01 **Artist / Producer** - creates, performs, interprets, or produces artistic works (e.g., dancers, sculptors, theatre companies)

02 **Sponsor or Presentor** - presents or exhibits arts events for the public (e.g., community concert series, performance facilities, museums, cinemas)

03 **Arts Service / Advocacy** - provides information, coordination, technical assistance, or other services to constituents; develops and/or organizes public support for the arts (e.g., consultants in the arts, arts councils, and service organizations such as the American Council for the Arts, National Assembly of Community Arts Agencies)

04 **Humanities Service / Advocacy** - provides information, coordination, or technical assistance to constituents; develops and/or organizes public support for the humanities

05 **Education** - involved in teaching / instruction

06 **Funding** - provides financial assistance in the arts such as grants, awards, etc. (e.g., The Ford Foundation)

07 **Media** - disseminator of information (e.g., television, newspaper, radio, columnist, reviewer, announcer)

08 **Interested in the Arts** - appreciative of the arts but not necessarily actively involved in the arts as artist, art teacher, etc.

09 **None of the above** - use only to designate an entry which *cannot* be coded; to leave an entry unclassified, use "00"

INSTITUTION

01 **Individual - Artist** - one who creates, performs, or interprets works of art
02 **Individual - Non-artist**
03 **Performing Group** - group of artists who perform works of art (e.g., an orchestra, theatre, or dance group)
04 **Performing Group - College / University** - a group of college or university students who perform works of art
05 **Performing Group - Community** - a group of persons who perform works of art avocationally and who may be but are not necessarily directed by professionals
06 **Performing Group - Youth** - a group which may but does not necessarily include children who perform works of art for young audiences
07 **Performance Facility** - a building or space used for presenting concerts, drama presentations, etc.
08 **Museum - Art** - an organization essentially educational or aesthetic in purpose with professional staff, which owns or utilizes works of art, cares for them, and exhibits them to the public in some regular schedule
09 **Museum - Other** - an organization essentially educational or aesthetic in purpose with professional staff, which owns or utilizes tangible objects, cares for them, and exhibits them to the public in some regular schedule (e.g., non-arts organizations such as historical, agricultural, scientific, industrial, and anthropological museums; zoos; aquariums; and arboretums)
10 **Gallery / Exhibition Space** - an organization or space which primarily exhibits works of art from collections other than its own, and may be involved in selling those works
11 **Cinema** - a motion picture theatre or organization which regularly shows films
12 **Small Press** - a non-commercial publisher or printing press which issues small editions of literary and other works
13 **Literary Magazine** - a non-commercial, numbered, serial publication devoted to contemporary poetry, fiction, drama, or literary criticism
14 **Fair / Festival** - a seasonal program of arts events
15 **Arts Center** - a multi-purpose facility for arts programming of various types
16 **Arts Council / Agency** - an arts organization (sometimes funded by public funds or sanctioned by some branch of government) which provides funding, arts administrative and/or programming services for its members / constituents within a specific geographic locale (e.g., county, state, community)
17 **Arts Service Organization** - an organization which does not as its central function produce or present the arts, but which assists others, including artists and arts organizations, in managing, producing, promoting, and presenting the arts to the public (e.g., Friends of the Philharmonic, Columbia Artists Management, Volunteer Lawyers for the Arts, American Council for the Arts, American Symphony Orchestra League)
18 **Union / Professional Association** - dedicated to the improvement of and/or providing benefits to individuals; the American Federation of Musicians (A.F. of M.) and the American Guild of Musical Artists (A.G.M.A.) are examples of unions; professional associations would include organizations such as the American Association of University Professors (include all local or regional artists' clubs, guilds, and societies)
19 **School District** - a geographic unit within a state comprised of member schools within that area as defined by the state government
20 **School - Parent-Teacher Association** - an organization composed of school parents who work with local school teachers and administrators
21 **School - Elementary** - also called a grammar school
22 **School - Middle** - also called a junior high school
23 **School - Secondary** - also called a senior high school
24 **School - Vocational / Technical** - trade school (e.g., school for secretarial, business, computer training)
25 **School - Other** - other school, such as one offering lessons and courses in karate, ballet, scuba diving, flower arranging, cooking, guitar, etc.
26 **College / University** - include state-supported colleges and universities, privately-supported colleges and universities, junior colleges, and community colleges

(continued)

27 Library
28 **Historical Society / Commission** - a historical "society" is an organization dedicated to the study and preservation of the history of a town or region, usually owning a collection of documents and/or artifacts and frequently based in a historic building; a historical "commission" is an arm of local government, usually volunteer, charged with the survey of historic buildings in a town or region
29 **Humanities Council / Agency** - an agency dedicated to funding the humanities receiving state and/or federal funds
30 **Foundation** - an endowed organization which dispenses funds for designated philanthropic purposes (include charitable trusts and corporate foundations)
31 **Corporation / Business** - a legal entity engaged in business or authorized to act with the rights and liabilities of a person
32 **Community Service Organization** - an organization which provides social, cultural, educational, and/or other services to the citizens of a community or region and/or to its own members (e.g., community concert series, Red Cross, Chamber of Commerce, Y.M.C.A., United Fund, Salvation Army, Elks Club, Masons, Junior League)
33 **Correctional Institution** - a prison, penitentiary, reformatory, etc.
34 **Health Care Facility** - hospital, nursing home, clinic, etc.
35 **Religious Organization** - church, synagogue, etc.
36 **Senior Citizens' Center** - usually a multi-purpose center expressly for the use of elderly citizens (e.g., nutrition center)
37 **Parks and Recreation** - usually a municipal agency which provides a wide variety of experiences for the population. In addition to administration of park facilities, services may include planned activities such as concerts, plays, and participatory activities (e.g., ceramics, macrame, and other crafts).
38 **Government - Executive** - the administrative branch of the government — federal, state, county, or local
39 **Government - Judicial** - judges and courts of law
40 **Government - Legislative (House)** - the representative body of government (commonly the House of Representatives) creating statutes / laws (include representatives and related others, such as legislative research personnel)
41 **Government - Legislative (Senate)** - the other legislative body of government (commonly the Senate) creating statutes / laws (include senators and related others, such as legislative research personnel)
42 **Media - Periodical** - a periodical publication (include magazines, journals, newsletters, etc.; do not include daily or weekly newspapers)
43 **Media - Daily Newspaper**
44 **Media - Weekly Newspaper**
45 **Media - Radio**
46 **Media - Television**
47 **None of the above** - use only to designate an entry which *cannot* be coded; to leave an entry unclassified, use "00"

DISCIPLINE — describes the constituent's primary arts discipline

Note: It is understood that an agency can elect to use main discipline categories only (e.g., Dance, Music, Theatre) and not sub-categories (e.g., mime, musical theatre, puppet). Also note that "Humanities" is listed for use by agencies which serve both the arts and humanities.

01 **Dance** - do not include mime; see "Theatre," 04, for mime
A ballet*
B ethnic / folk / jazz*
C modern*

*Optional

02 **Music**
- A band* - do not include jazz or popular
- B chamber*
- C choral*
- D contemporary* - include experimental, electronic
- E ethnic / folk*
- F jazz*
- G popular* - include rock
- H solo / recital*
- I symphonic*

03 **Opera** - do not include musical theatre; see "Theatre," 04, for musical theatre

04 **Theatre**
- A theatre-general* - include classical, contemporary, experimental
- B mime*
- C musical theatre*
- D puppet*
- E theatre for young audiences*

05 **Visual Arts**
- A conceptual art* (See "Type of Artist," 20, p.158.)
- B graphics* (See "Type of Artist," 03, p.157.)
- C inter-media* (See "Type of Artist," 22, p.158.)
- D painting* (See "Type of Artist," 04, p.157.)
- E performance art* (See "Type of Artist," 21, p.158.)
- F sculpture*

06 **Architecture / Design** - include fields of architecture; landscape architecture; urban design; city and regional planning; interior, industrial, fashion, and other recognized design professions (See "Type of Artist," 01, 02, p.157.)

07 **Crafts** - pertaining to artists who work in one or more of the following media: paper, glass, leather, clay, metals, wood, fibers, or plastics (See "Type of Artist," 09, 14, 16, 17, pp.157-158.)

08 **Photography**

09 **Media Arts**
- A film*
- B radio*
- C television*
- D video* (include holography)

10 **Literature** - include fiction, non-fiction, poetry, and playwriting

11 **Community Arts** - serving and responding to the needs of a specific community and offering broad access to arts experiences as defined by that community; often community-initiated, directed, and supported (e.g., performing or exhibiting groups resident in a community with primary audience the citizens of that community; projects emphasizing participation by and/or teaching of non-artists)

12 **Folk Arts** - pertaining to oral, customary, material, and performance traditions informally learned and transmitted in contexts characteristic of ethnic, religious, linguistic, occupational and/or regional groups

13 **Humanities** - pertaining but not limited to the following fields: history, philosophy, languages, literature, linguistics, archaeology, jurisprudence, history and criticism of the arts, ethics, comparative religion, and those aspects of the social sciences employing historical or philosophical approaches. This last category includes cultural anthropology, sociology, political theory, international relations, and other subjects concerned with questions of value and not with quantitative matters.

14 **Multi-disciplinary** - pertaining to two or more arts and/or humanities disciplines

15 **Non-arts / Non-humanities** - none of the above

*Optional

"CONTENT" — describes *what kind of mail* the constituent should receive; see the DISCIPLINE section of the "TARGET" code, pp.116-117, for definitions.

01 **Dance** - information about Dance
02 **Music** - information about Music
03 **Opera** - information about Opera
04 **Theatre** - information about Theatre
05 **Visual Arts** - information about Visual Arts
06 **Architecture / Design** - information about Architecture / Design
07 **Crafts** - information about Crafts
08 **Photography** - information about Photography
09 **Media Arts** - information about Media Arts
10 **Literature** - information about Literature
11 **Community Arts** - information about Community Arts
12 **Folk Arts** - information about Folk Arts
13 **Humanities** - information about Humanities
14 **Multi-disciplinary** - information about two or more arts and/or humanities disciplines
15 **Arts Advocacy / Service** - information about Arts Advocacy / Service
16 **Arts Management** - information about Arts Management
17 **Disabled / Handicapped** - information about issues, programs, etc. in the arts and/or humanities concerning disabled / handicapped persons
18 **Ethnic / Minority** - information about issues, programs, etc. in the arts and/or humanities concerning ethnic / minority persons
19 **Senior Citizens** - information about issues, programs, etc. in the arts and/or humanities concerning senior citizens

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20 Newsletter*
21 Press Releases*
22 Program Information*
23 Board / Council Material*
24 Panel Material*
etc.

*Example; actual items to be determined by each agency using the code

Selections

1. **Select by One Code** NECESSARY

Selection of entries according to a single National Standard "Mail Code."

Examples: "Get any entries that are marked...
...as nonprofit organizations (STATUS 02 - Organization - Nonprofit)."
...as individual artists (INSTITUTION 01 - Individual - Artist)."
...to receive the newsletter ("CONTENT" 20 - Newsletter)."

2. **Select by a Combination of Codes** NECESSARY

Selection of entries according to a combination of National Standard "Mail Code" parts, including both "and" and "or" combinations.

Examples: "Get any entries that are marked...
...as nonprofit arts centers (STATUS 02 - Organization - Nonprofit, *and* INSTITUTION 15 - Arts Center)."
...as individual visual artists and photographers (INSTITUTION 01 - Individual - Artist and DISCIPLINE 08 - Photography, *and* DISCIPLINE 05 - Visual Arts)."
...as museums of any type (INSTITUTION 08 - Museum - Art, *or* INSTITUTION 09 - Museum - Other)."

3. **Select by "ZIP Code"** OPTIONAL

Selection of entries according to "ZIP Code" or range of ZIP Codes.

Examples: "Get any entries which have ZIP Code...
...20036 (an area of Washington, D.C.)."
...between 20000 and 20099 (most of the Washington metropolitan area)."

4. **Select by "City"** OPTIONAL

Selection of entries in a particular city.

Examples: "Get any entries in...
...San Francisco."
...Memphis."
...Poughkeepsie."

5. **Select by Two or More Fields** OPTIONAL

Selection of entries by two or more fields.

Examples: "Get any entries that are marked...
...as nonprofit arts service organizations (STATUS 02 - Organization - Nonprofit and FUNCTION 03 - Arts Service / Advocacy) which have ZIP Code 10012 ('ZIP Code')."
...as private elementary schools (STATUS 02 - Organization - Nonprofit and INSTITUTION 21 - School - Elementary) in Kalamazoo ('City')."
...as individual visual artists and craftspersons (INSTITUTION 01 - Individual - Artist and DISCIPLINE 05 - Visual Arts *and* DISCIPLINE 07 - Crafts) in Cambridge ('City') which have ZIP Code 02139 ('ZIP Code')."

Reports

1. Adhesive Labels — NECESSARY

Format: adhesive labels in any size and in any combination (single, three across the page, four across the page, on 8 ½" x 11" pages, continuous strips, etc.)

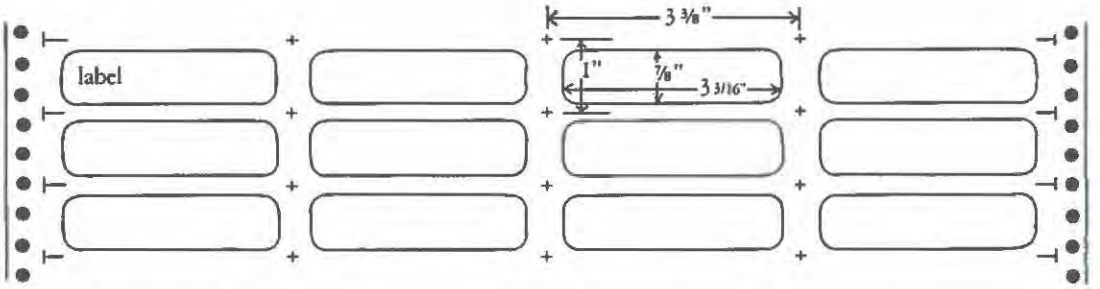
Example:

Contact Person*
Contact Person Title*
Name (organization or individual)
Address 1
Address 2
City State ZIP Code

2. 4-Up Adhesive Labels — OPTIONAL

Format: four labels across the page, measuring 3 3/16" by 7/8" each, centered in 3 3/8" by 1" boxes across the page

Example:

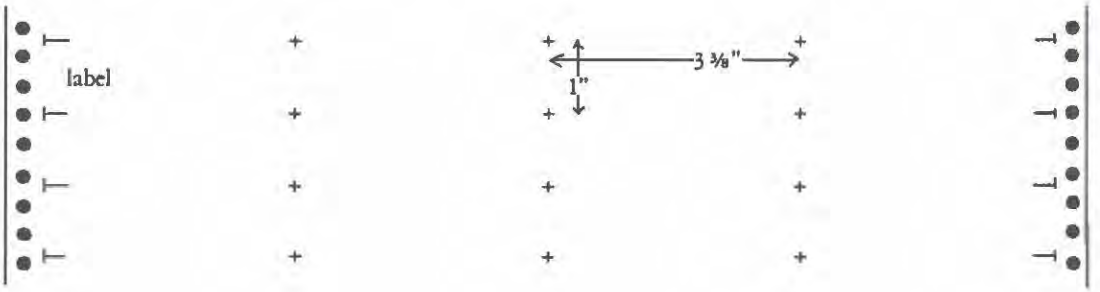


3. 4-Up Cheshire Labels — OPTIONAL

Format: four addresses across the page, each centered in 3 3/8" by 1" boxes across the page, spaced as for 2 above, but printed on paper rather than on adhesive labels

Note: Cheshire labels are cut and glued to mailing pieces by equipment available at most commercial mail firms. Arts agencies should investigate the availability of such service in their areas, since both the printing stock and application to mail pieces is substantially less expensive than for adhesive labels.

Example:



*Optional

4. List — OPTIONAL

Format: see Figure 1

Fields:

Label		Possible Field Size
1. Contact Person*		20
2. Contact Person Title*		20
Name (organization or individual)		30
Address 1		20
Address 2		20
City		16
State		2
ZIP Code		10
3. Mail Code		
"TARGET":	STATUS	2
	FUNCTION	2
	INSTITUTION	2
	DISCIPLINE	3
"CONTENT"		32

Note: One of the most significant powers of a computer or other electronic system is its ability to sort — that is to put entries into a particular order. If possible, a system should have the ability to sort for printing by "Name (organization or individual)" and/or by "ZIP Code."

Figure 1

Note: In a computer or other electronic system, this report will be useful as an edit (i.e., a printed list of each entry which is used to confirm data accuracy and note necessary corrections and additions). If such use is planned for this report, the system should allow adequate spacing between lines and entries for writing notes and changes.

LIST
Arts Agency**
00 / 00 / 00**

Contact Person*	Title*		Name (org. or indiv.)	Address 1	Address 2
City	State	ZIP Code		Mail Code	

*Optional
** It is assumed that each report will include the arts agency's name and date.

Grants Management System

Fields

APPLICANT

Label	Type Required	Need	Possible Field Size
1. Applicant	Constituent	Necessary	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
2. Contact Person	Text	Necessary	20
3. Contact Person Title	Text	Optional	20
4. Telephone	Numeric	Optional	12
5. Contact Person Home Telephone	Numeric	Optional	12
6. Authorizing Official	Text	Optional	20
7. County of Applicant	Numeric or Text	Optional	12
8. Legislative District of Applicant (House)	Numeric or Text	Optional	3
9. Legislative District of Applicant (Senate)	Numeric or Text	Optional	3
10. Congressional District of Applicant	Numeric	Necessary	3
11. Region of Applicant	Numeric or Text	Optional	3
12. FEI or Social Security Number	Numeric	Optional	9
13. Incorporation or Birth Date	Date	Optional	6

Note: Further specification allowing an agency to select particular types of organizations or individuals will be available if the agency's grants management system is cross-referenced to the National Standard Mailing List System "Mail Code." If a concurrent mailing list system is not available, a field labeled "Applicant Type" would be appropriate here.

14. Previous Year Income	Numeric	Optional	9
15. Previous Year Expenditures	Numeric	Optional	9
16. Current Year Income	Numeric	Optional	9
17. Current Year Expenditures	Numeric	Optional	9
18. Next Year Income	Numeric	Optional	9
19. Next Year Expenditures	Numeric	Optional	9

PROCESS

Label	Type Required	Need	Possible Field Size
20. Application Number	Numeric or Text	Optional	9
21. Date Received	Date	Optional	6
22. Date Logged In	Date	Optional	6
23. Program	Numeric or Text	Optional	2

Note: It is understood that most agencies have recommendation processes which precede grant awards. Information on such recommendations is appropriate here. Such fields, however, are not included in the National Standard because of the unique nature of each agency's recommendation process and minimal need for national compatibility.

24. Grant Award	Numeric	Necessary	6
25. Grant Award Date	Date	Optional	6
26. Notification Date	Date	Optional	6
27. Date Contract Received	Date	Optional	6
28. Payee	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10

Note: Grant payments are generally a function of an accounting system; however, inclusion of fields such as "Check Number," "Payment Date," "Account Number," "Federal Share," "State Share," etc., may be appropriate in a grants management system if a concurrent fiscal system is not available to record such information.

29. Date Report Due	Date	Optional	6
30. Date Report Received	Date	Optional	6
31. Status	Numeric or Text	Optional	1

Note: It is understood that many agencies' grants are re-granted by applicants. It is appropriate to include information on such sub-grants here. Normally the information would simply be a cross-reference to another set of applications or a list of sub-grantees.

PROJECT

Label	Type Required	Need	Possible Field Size
32. Project Title	Text	Optional	40

Note: Narrative project descriptions are generally a function of a word processing system; however, inclusion of a field labeled "Project Description" may be appropriate in a grants management system if such information is essential and a concurrent word processing system is not available.

33. Project Director	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10

(continued)

34. Project Director Telephone	Numeric	Optional	12
35. Project Director Title	Text	Optional	20
36. Start Date	Date	Optional	6
37. End Date	Date	Optional	6
38. Discipline	Numeric	Necessary	3
39. Type of Activity	Numeric	Optional	2
40. City	Text	Optional	16
41. County	Text	Optional	12
42. Legislative District (House)	Numeric or Text	Optional	3
43. Legislative District (Senate)	Numeric or Text	Optional	3
44. Congressional District	Numeric	Optional	2
45. Region	Numeric or Text	Optional	3
46. Personnel - Administrative	Numeric	Optional	6
47. Personnel - Artistic	Numeric	Optional	6
48. Personnel - Technical / Production	Numeric	Optional	6
49. Outside Professional Services - Artistic	Numeric	Optional	6
50. Outside Professional Services - Other	Numeric	Optional	6
51. Space Rental	Numeric	Optional	6
52. Travel	Numeric	Optional	6
53. Marketing	Numeric	Optional	6
54. Remaining Operating Expenses	Numeric	Optional	6
55. Capital Expenditures - Acquisitions	Numeric	Optional	6
56. Capital Expenditures - Other	Numeric	Optional	6
57. Total Cash Expenses	Numeric	Optional	8
58. In-kind Personnel - Administrative	Numeric	Optional	6
59. In-kind Personnel - Artistic	Numeric	Optional	6
60. In-kind Personnel - Technical / Production	Numeric	Optional	6
61. In-kind Outside Professional Services - Artistic	Numeric	Optional	6
62. In-kind Outside Professional Services - Other	Numeric	Optional	6
63. In-kind Space Rental	Numeric	Optional	6
64. In-kind Travel	Numeric	Optional	6
65. In-kind Marketing	Numeric	Optional	6
66. In-kind Remaining Operating Expenses	Numeric	Optional	6
67. In-kind Capital Expenditures - Acquisitions	Numeric	Optional	6

68. In-kind Capital Expenditures - Other	Numeric	Optional	6
69. Total In-kind Contributions	Numeric	Optional	8
70. Admissions	Numeric	Optional	6
71. Contracted Services Revenue	Numeric	Optional	6
72. Corporate Contributions	Numeric	Optional	6
73. Foundation Grants	Numeric	Optional	6
74. Other Private Contributions	Numeric	Optional	6
75. Government Grants - Federal	Numeric	Optional	6
76. Government Grants - State / Regional	Numeric	Optional	6
77. Government Grants - Local	Numeric	Optional	6
78. Other Revenue	Numeric	Optional	6
79. Applicant Cash	Numeric	Optional	6
80. Total Applicant Cash Revenue	Numeric	Optional	8
81. Grant Amount Requested	Numeric	Necessary	6
82. Total Cash Revenue	Numeric	Optional	8
83. Individuals to Benefit	Numeric	Optional	8
84. Artists Participating	Numeric	Optional	6
85. Full-time Personnel	Numeric	Optional	6
86. Part-time Personnel	Numeric	Optional	6
87. Volunteers	Numeric	Optional	6
88. Provider of Services	Constituent	Optional	N/A

ONE CONSTITUENT FROM THE CONSTITUENT LIST	
Name (organization or individual)	30
Address 1	20
Address 2	20
City	16
State	2
ZIP Code	10

(continued)

REPORT

Label	Type Required	Need	Possible Field Size
89. Actual Personnel - Administrative	Numeric	Optional	6
90. Actual Personnel - Artistic	Numeric	Optional	6
91. Actual Personnel - Technical / Production	Numeric	Optional	6
92. Actual Outside Professional Services - Artistic	Numeric	Optional	6
93. Actual Outside Professional Services - Other	Numeric	Optional	6
94. Actual Space Rental	Numeric	Optional	6
95. Actual Travel	Numeric	Optional	6
96. Actual Marketing	Numeric	Optional	6
97. Actual Remaining Operating Expenses	Numeric	Optional	6
98. Actual Capital Expenditures - Acquisitions	Numeric	Optional	6
99. Actual Capital Expenditures - Other	Numeric	Optional	6
100. Actual Total Cash Expenses	Numeric	Necessary	8
101. Actual In-kind Personnel - Administrative	Numeric	Optional	6
102. Actual In-kind Personnel - Artistic	Numeric	Optional	6
103. Actual In-kind Personnel - Technical / Production	Numeric	Optional	6
104. Actual In-kind Outside Professional Services - Artistic	Numeric	Optional	6
105. Actual In-kind Outside Professional Services - Other	Numeric	Optional	6
106. Actual In-kind Space Rental	Numeric	Optional	6
107. Actual In-kind Travel	Numeric	Optional	6
108. Actual In-kind Marketing	Numeric	Optional	6
109. Actual In-kind Remaining Operating Expenses	Numeric	Optional	6
110. Actual In-kind Capital Expenditures - Acquisitions	Numeric	Optional	6
111. Actual In-kind Capital Expenditures - Other	Numeric	Optional	6
112. Actual Total In-kind Contributions	Numeric	Necessary	8
113. Actual Admissions	Numeric	Optional	6

114. Actual Contracted Services Revenue	Numeric	Optional	6
115. Actual Corporate Contributions	Numeric	Optional	6
116. Actual Foundation Grants	Numeric	Optional	6
117. Actual Other Private Contributions	Numeric	Optional	6
118. Actual Government Grants - Federal	Numeric	Optional	6
119. Actual Government Grants - State / Regional	Numeric	Optional	6
120. Actual Government Grants - Local	Numeric	Optional	6
121. Actual Other Revenue	Numeric	Optional	6
122. Actual Applicant Cash	Numeric	Optional	6
123. Actual Total Applicant Cash Revenue	Numeric	Necessary	8
124. Grant Amount Spent	Numeric	Necessary	6
125. Actual Total Cash Revenue	Numeric	Necessary	8
126. Actual Individuals Benefiting	Numeric	Necessary	8
127. Characteristics	Text	Optional*	6
128. Actual Artists Participating	Numeric	Optional	6
129. Characteristics	Text	Optional*	6
130. Actual Full-time Personnel	Numeric	Optional	6
131. Actual Part-time Personnel	Numeric	Optional	6
132. Actual Volunteers	Numeric	Optional	6

Definitions

APPLICANT

1. Applicant

Include one Constituent as defined in the Constituent List.

2. Contact Person
The person to contact for additional information about the application.

3. Contact Person Title
The official title of "Contact Person."

4. Telephone
The office telephone number of "Applicant" or "Contact Person."

5. Contact Person Home Telephone
The home telephone number of "Contact Person."

6. Authorizing Official
Name of person with authority to legally obligate "Applicant."

7. County of Applicant
County or parish of the office immediately responsible for the application. In most cases, this would be the county in which "Applicant's" business address is located.

(continued)

*pending National Endowment for the Arts review of Title VI legislation

8. **Legislative District of Applicant (House)**
   District of state legislative representative body (commonly the state House of Representatives) in which "Applicant's" business address is located.
9. **Legislative District of Applicant (Senate)**
   District of other state legislative body (commonly the state Senate) in which "Applicant's" business address is located.
10. **Congressional District of Applicant**
    District of the United States House of Representatives in which "Applicant's" business address is located.
11. **Region of Applicant**
    Sub-state region of "Applicant's" business address.
12. **FEI or Social Security Number**
    Federal Employer Identification Number if "Applicant" is an organization; Social Security Number if "Applicant" is an individual.
13. **Incorporation or Birth Date**
    Incorporation date if "Applicant" is an organization; birth date if "Applicant" is an individual.
14. **Previous Year Income**
    Total income or receipts of "Applicant" (organization) during "Applicant's" previous fiscal year.
15. **Previous Year Expenditures**
    Total expenditures or disbursements of "Applicant" (organization) during "Applicant's" previous fiscal year.
16. **Current Year Income**
    Total income or receipts of "Applicant" (organization) during "Applicant's" current fiscal year.
17. **Current Year Expenditures**
    Total expenditures or disbursements of "Applicant" (organization) during "Applicant's" current fiscal year.
18. **Next Year Income**
    Estimated total income or receipts of "Applicant" (organization) during "Applicant's" next fiscal year.
19. **Next Year Expenditures**
    Estimated total expenditures or disbursements of "Applicant" (organization) during "Applicant's" next fiscal year.

Note: Additional fields such as "Treasurer," "Board President," etc., are primarily documentary and are not appropriate pieces of information in the National Standard because of the unique nature of each agency's requirements and minimal need for national compatibility of such information.

PROCESS

20. **Application Number**
    An indicator assigned to the application and used in reference to it on other documents.
21. **Date Received**
    Date application is received in agency office.
22. **Date Logged In**
    Date which marks the first formal involvement of the agency in the application process (i.e., application is acknowledged, copies are sent to appropriate people, the application is filed, etc.). Often the same as "Date Received."
23. **Program**
    A numeric or text code describing the program of the agency under which the applicant is requesting support (e.g., P = Performing Arts, V = Visual Arts, M = Mini-Grant) *as defined by agency*. Program should be the same as that stated in the program guidelines and/or announcements if appropriate.

24. **Grant Award**
Dollar amount of grant awarded. If the application was not funded, enter 0. A blank field indicates that a decision has not been made.

Note: Agencies involved in non-monetary or unconventional grant programs may establish a basis upon which their programs can be valued. In many cases, such a basis can be a dollar amount equivalent to service provided. In such cases, use of "Grant Award" should be consistent and its unusual nature understood.

25. **Grant Award Date**
Date on which "Grant Award" is formally made.

26. **Notification Date**
Date on which "Applicant" is formally informed of the grant decision. Usually the date of grant award or rejection letter.

27. **Date Contract Received**
Date on which required documents are received from "Applicant." In some cases, these will be acceptance letters or letters of agreement rather than formal contracts.

28. **Payee**
Include Constituent List entry if different from "Applicant."

Include one Constituent as defined in the Constituent List.

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29. **Date Report Due**
Date on which final report of "Applicant's" project is due.

30. **Date Report Received**
Date on which final report of "Applicant's" project is received in agency office.

31. **Status**
A descriptor summarizing the status of an application in the agency's grant process (e.g., W = Withdrawn, I = Ineligible).

Note: It is understood that most agencies have a series of steps through which all applications pass for research, review, recommendation / rejection, funding, reporting, etc., and that the status of an application at any given time depends on where it is in this process. A code is not developed in the National Standard because of the unique nature of each agency's grant process and minimal need for national compatibility of such information.

PROJECT

32. **Project Title**
A short descriptive title of the project for which "Applicant" is requesting assistance. If no formal title exists or if the title is not descriptive, a short phrase describing the activities of the project should be substituted.

33. **Project Director**
The person with immediate responsibility for the project, if different from "Contact Person." Include Constituent List entry if home address is desired; otherwise name only.

Include one Constituent as defined in the Constituent List.

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34. **Project Director Telephone**
Telephone number of "Project Director" if different from "Telephone."

35. **Project Director Title**
The official title of "Project Director."

36. **Start Date**
The first date of activity in the project for which assistance is requested.

37. **End Date**
The last date of activity in the project for which assistance is requested.

(continued)

38. Discipline

The arts discipline in which project activities are involved. The following code will be used:
(see pp.116-117 for definitions)

Note: It is understood that an agency can elect to use main discipline categories only (e.g., Dance, Music, Theatre) and not sub-categories (e.g., mime, musical theatre, puppet). Also note that "Humanities" is listed for use by agencies which serve both the arts and humanities.

01 **Dance**
- A ballet*
- B ethnic / folk / jazz*
- C modern*

02 **Music**
- A band* (do not include jazz or popular)
- B chamber*
- C choral*
- D contemporary* (include experimental, electronic)
- E ethnic / folk*
- F jazz*
- G popular* (include rock)
- H solo / recital*
- I symphonic*

03 **Opera**

04 **Theatre**
- A theatre - general* (include classical, contemporary, experimental)
- B mime*
- C musical theatre*
- D puppet*
- E theatre for young audiences*

05 **Visual Arts**
- A conceptual art*
- B graphics*
- C inter-media*
- D painting*
- E performance art*
- F sculpture*

06 **Architecture / Design**

07 **Crafts**

08 **Photography**

09 **Media Arts**
- A film*
- B radio*
- C television*
- D video* (include holography)

10 **Literature**

11 **Community Arts**

12 **Folk Arts**

13 **Humanities**

14 **Multi-disciplinary**

15 **Non-arts / Non-humanities**

39. Type of Activity

The type of activity which best describes the project activities. The following code will be used:

01 **acquisition** - see Field 55
02 **audience transportation** - e.g., busing senior citizens to a performance
03 **award / fellowship** - to individuals
04 **commission** - e.g., "commissioning a work of music"
05 **concert / performance** - include film, video, and literary presentations
06 **exhibition**
07 **facility design, construction, maintenance**
08 **fair / festival** - a seasonal program of arts events
09 **identification / documentation** - e.g., for archival or educational purposes
10 **institution / organization establishment** - for creation or development of a new institution / organization
11 **institution / organization support** - general operational support
12 **instruction / class / lecture** - include lecture-demonstrations and workshops
13 **marketing** - see Field 53
14 **professional support - administrative** - see Field 46
15 **professional support - artistic** - see Field 47
16 **publication / recording / film** - to create a work of art (e.g., a book, a record, a film)
17 **instructional publication** - e.g., manuals, textbooks, how-to's
18 **repair / restoration / conservation**
19 **research / planning**
20 **school residency** - artists in residence in an educational institution
21 **other residency** - artists in residence in other than educational institutions
22 **seminar / conference**
23 **touring** - include support of touring groups or exhibitions, not of sponsors
24 **other**

*Optional

40. **City**
Post office address of community in which the majority of project activities will take place.

41. **County**
The county or parish in which the majority of project activities will take place.

42. **Legislative District (House)**
District of state legislative body (commonly the state House of Representatives) in which the majority of project activities will take place.

43. **Legislative District (Senate)**
District of other state legislative body (commonly the state Senate) in which the majority of project activities will take place.

44. **Congressional District**
District of the United States House of Representatives in which the majority of project activities will take place.

45. **Region**
Sub-state region in which the majority of project activities will take place.

46. **Personnel - Administrative**
Payments for salaries, wages, fees, and benefits specifically identified with the project, for executive and supervisoty administrative staff, program directors, managing directors, business managers, press agents, fund raisers; clerical staff such as secretaries, typists, bookkeepers; and supportive personnel such as maintenance and security staff, ushers and other front-of-the-house and box office personnel.

47. **Personnel - Artistic**
Payments for salaries, wages, fees, and benefits specifically identified with the project, for artistic directors, directors, conductors, curators, dance masters, composers, choreographers, designers, video artists, filmmakers, painters, poets, authors, sculptors, graphic artists, actors, dancers, singers, musicians, teachers, instructors, puppeteers, etc.

48. **Personnel - Technical / Production**
Payments for salaries, wages, fees, and benefits specifically identified with the project, for technical management and staff, such as technical directors; wardrobe, lighting and sound crew; stage managers, stagehands; video and film technicians, etc.

49. **Outside Professional Services - Artistic**
Payments to firms or persons for the services of individuals who are not normally considered employees of "Applicant," but consultants or the employees of other organizations, whose services are specifically identified with the project. Include artistic directors, directors, conductors, curators, dance masters, composers, choreographers, designers, video artists, filmmakers, painters, poets, authors, sculptors, graphic artists, actors, dancers, singers, musicians, teachers, instructors, etc. serving in non-employee / non-staff capacities.

50. **Outside Professional Services - Other**
Payments to firms or persons for non-artistic services of individuals who are not normally considered employees of "Applicant," but consultants or the employees of other organizations, whose services are specifically identified with the project.

51. **Space Rental**
Payments specifically identified with the project for rental of office, rehearsal, theatre, hall, gallety, and other such spaces.

52. **Travel**
All costs for travel directly related to the travel of an individual or individuals from "Applicant" (organization) and specifically identified with the project. For transportation not connected with the travel of personnel, see "Remaining Operating Expenses," Field 54. Include fares, hotel, and other lodging expenses, food, taxis, gratuities, per diem payments, toll charges, mileage, allowances on personal vehicles, car rental costs, etc.

53. **Marketing**
All costs for marketing / publicity / promotion specifically identified with the project. Do not include payments to individuals or firms which belong under "Personnel," Fields 46-48, or "Outside Professional Services," Fields 49-50. Include costs of newspaper, radio, and television advertising, printing and mailing of brochures, flyers, and posters, and food, drink, and space rental when directly connected to fund-raising or promotion.

(continued)

54. **Remaining Operating Expenses**
All expenses not entered in other categories and specifically identified with the project. Include scripts and scores, lumber and nails, electricity, telephone and telegraph, storage, postage, interest charges, photographic supplies, publication purchases, sets and props, food consumed on premises, equipment rental, insurance fees, non-structural renovations or improvements, trucking, shipping, and hauling expenses not entered under "Travel," Field 52.

55. **Capital Expenditures - Acquisitions**
Expenses for additions to a collection, such as works of art, artifacts, plants, animals or historic documents, the purchase of which is specifically identified with the project.

56. **Capital Expenditures - Other**
Expenses for purchase of buildings or real estate, renovations or improvements involving structural change, payments for roads, driveways, or parking lots, permanent and generally immobile equipment such as grid systems or central air conditioning, etc., which are specifically identified with the project.

57. **Total Cash Expenses**
The total of Fields 46-56 above.

58. **In-kind Personnel - Administrative**
Salaries, wages, fees, and benefits for administrative personnel (see Field 46 for definition) specifically identified with the project which are defrayed by in-kind contributions.

59. **In-kind Personnel - Artistic**
Salaries, wages, fees, and benefits for artistic personnel (see Field 47 for definition) specifically identified with the project which are defrayed by in-kind contributions.

60. **In-kind Personnel - Technical / Production**
Salaries, wages, fees, and benefits for technical / production personnel (see Field 48 for definition) specifically identified with the project which are defrayed by in-kind contributions.

61. **In-kind Outside Professional Services - Artistic**
Expenses for artistic outside professional services (see Field 49 for definition) specifically identified with the project which are defrayed by in-kind contributions.

62. **In-kind Outside Professional Services - Other**
Expenses for other outside professional services (see Field 50 for definition) specifically identified with the project which are defrayed by in-kind contributions.

63. **In-kind Space Rental**
Expenses for space rental (see Field 51 for definition) specifically identified with the project which are defrayed by in-kind contributions.

64. **In-kind Travel**
Expenses for travel (see Field 52 for definition) specifically identified with the project which are defrayed by in-kind contributions.

65. **In-kind Marketing**
Expenses for marketing (see Field 53 for definition) specifically identified with the project which are defrayed by in-kind contributions.

66. **In-kind Remaining Operating Expenses**
Expenses for remaining operating expenses (see Field 54 for definition) specifically identified with the project which are defrayed by in-kind contributions.

67. **In-kind Capital Expenditures - Acquisitions**
Expenses for acquisitions (see Field 55 for definition) specifically identified with the project which are defrayed by in-kind contributions.

68. **In-kind Capital Expenditures - Other**
Other capital expenditures (see Field 56 for definition) specifically identified with the project which are defrayed by in-kind contributions.

69. **Total In-kind Contributions**
The total of Fields 58-68 above.

70. **Admissions**
Revenue derived from the sale of admissions, tickets, subscriptions, memberships, etc., for events of the project.

71. **Contracted Services Revenue**
Revenue derived from fees earned through sale of services (other than this grant request). Include sale of workshops, etc. to other community organizations, government contracts for specific services, performance or residency fees, tuition, etc.

72. **Corporate Contributions**
Revenue derived from contributions given for this project (other than this grant request) by businesses and corporations, or a proportionate share of such contributions allocated to this project.

73. **Foundation Grants**
Revenue derived from grants given for this project (other than this grant request) by private foundations, or a proportionate share of such grants allocated to this project.

74. **Other Private Contributions**
Revenue derived from cash donations given for this project or a proportionate share of general donations allocated to this project. Do not include corporate, foundation, or government contributions and grants.

75. **Government Grants - Federal**
Revenue derived from grants given for this project (other than this grant request) by agencies of the federal government, or a proportionate share of such grants allocated to this project.

76. **Government Grants - State / Regional**
Revenue derived from grants given for this project (other than this grant request) by agencies of the state government and/or multi-state consortiums of state agencies, or a proportionate share of such grants allocated to this project.

77. **Government Grants - Local**
Revenue derived from grants given for this project (other than this grant request) by city, county, in-state regional, and other local government agencies, or a proportionate share of such grants allocated to this project.

78. **Other Revenue**
Revenue derived from sources other than those listed above. Include catalog sales, advertising space in programs, gift shop income, concessions, parking, etc.

79. **Applicant Cash**
Funds from "Applicant's" accumulated resources that "Applicant" has budgeted or reasonably anticipates needing before the project takes place. For final reporting purposes, if less is required by the project, "Applicant" should report only the amount required.

80. **Total Applicant Cash Revenue**
The total of Fields 70-79 above.

81. **Grant Amount Requested**
Amount requested in support of this project.

82. **Total Cash Revenue**
The total of Fields 80-81 above.

83. **Individuals to Benefit**
The total audience, participants, students, etc., (excluding employees and/or paid performers) that are anticipated to benefit directly from this project.

84. **Artists Participating**
The total number of artists directly involved in providing artistic services specifically identified with the project.

85. **Full-time Personnel**
The total number of persons employed 35 or more hours per week on work which is specifically identified with the project.

(continued)

86. **Part-time Personnel**
The total number of persons employed less than 35 hours per week on work which is specifically identified with the project.

87. **Volunteers**
The total number of volunteers whose services are specifically identified with the project.

88. **Provider of Services**
The constituent providing the artistic or other service(s) for which "Applicant" is requesting assistance. Include artist, performing group, exhibit-producing organization, consultant, or other contracted specialist.

Include one Constituent as defined in the Constituent List.

REPORT

89 - 123. **"Actual" Financial Information**
Actual amounts for expenses and revenue as defined for Fields 46-80.

124. **Grant Amount Spent**
Actual grant amount spent on the project.

125. **Actual Total Cash Revenue**
The total of Fields 123 and 124 above.

126. **Actual Individuals Benefiting**
Actual number of individuals benefiting as defined in Field 83.

127. **Characteristics**
Descriptors designed to enable an agency to identify "Actual Individuals Benefiting," Field 126, according to those persons' characteristics. The following code will be used:

Note: Unlike other National Standard codes, several of these code categories may apply in any given case. Therefore, all applicable codes should be selected (e.g., a Native American audience of deaf eleventh graders would be coded "NYD"). Any categories needed by an agency but not available here (e.g., French American, rural, preschool, summer resident) can be added, but it must be understood that these categories would be used *in addition to* and *not instead of* the National Standard (e.g., a French American audience would be coded as such in addition to "W - White, not Hispanic").

N American Indian / Alaskan Native*
A Asian / Pacific Islander*
B Black, not Hispanic*
H Hispanic*
W White, not Hispanic*

G general

C child
Y secondary school student

U college / university student
S senior citizen

E emotionally and mentally disabled
P physically disabled
D hearing impaired
Q visually impaired

I institutionalized
V veteran
F woman

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*From Directive No. 15 which supersedes section 7 (h) and Exhibit F of OMB Circular No. A-46 dated May 3, 1971 and as revised May 12, 1977:

"The basic racial and ethnic categories for Federal statistics and program administrative reporting are defined as follows:

a. **American Indian or Alaskan Native.** A person having origins in any of the original peoples of North America, and who maintains cultural identification through tribal affiliation or community recognition.
b. **Asian or Pacific Islander.** A person having origins in any of the original peoples of the Far East, Southeast Asia, the Indian subcontinent, or the Pacific Islands. This area includes, for example, China, India, Japan, Korea, the Philippine Islands, and Samoa.
c. **Black.** A person having origins in any of the black racial groups of Africa.
d. **Hispanic.** A person of Mexican, Puerto Rican, Cuban, Central or South American or other Spanish culture or origin, regardless of race.
e. **White.** A person having origins in any of the original peoples of Europe, North Africa, or the Middle East.

"If a combined format is used to collect racial and ethnic data, the minimum acceptable categories are: American Indian or Alaskan Native; Asian or Pacific Islander; Black, not of Hispanic origin; Hispanic; White, not of Hispanic origin.

"The category which most closely reflects the individual's recognition in his community should be used for purposes of reporting on persons who are of mixed racial and/or ethnic origins."

128. **Actual Artists Participating**
Actual number of artists participating in the project as defined in Field 84.

129. **Characteristics**
Descriptors designed to enable an agency to identify "Actual Artists Participating," Field 128, according to those persons' characteristics. See Field 127 for code.

130. **Actual Full-time Personnel**
Actual number of full-time personnel participating in the project as defined in Field 85.

131. **Actual Part-time Personnel**
Actual number of part-time personnel participating in the project as defined in Field 86.

132. **Actual Volunteers**
Actual number of volunteers participating in the project as defined in Field 87.

Selections

1. **Select by "Applicant"** NECESSARY
Selection of grant applications according to "Name (organization or individual)" of "Applicant."

Examples: "Get any applications from...
...the Metropolitan Opera."
...the Sarasota Senior Citizens Guild."
...Southwest Arts Council."

2. **Select by "Congressional District of Applicant"** NECESSARY
Selection of grant applications according to "Congressional District of Applicant."

Examples: "Get any applications from...
...Congressional District 1."
...the third Congressional District of Louisiana.

3. **Select by "Discipline"** NECESSARY
Selection of grant applications according to "Discipline."

Examples: "Get any applications for funding in...
...music ('Discipline' 02)."
...visual arts ('Discipline' 05)."
...community arts ('Discipline' 11)."

4. **Select by "City"** NECESSARY
Selection of grant applications according to "City."

Examples: "Get any applications from...
...Honolulu."
...Montpelier."
...El Paso."

5. **Select by "Grant Award"** NECESSARY
Selection of grant applications according to "Grant Award."

Examples: "Get any applications for which...
...'Grant Award' is less than 1,000."
...'Grant Award' is zero (all grant applications which were not funded)."
...'Grant Award' is between $1,000 and $5,000."
...a decision has not been made ('Grant Award' is left blank)."

(continued)

6. **Select by Two or Three Necessary Fields** NECESSARY

Selection of grant applications according to any two or three of these fields:
"Applicant"
"Congressional District of Applicant"
"Discipline"
"City"
"Grant Award"

Examples: "Get any applications...
...for dance ('Discipline' 01) in Fort Lauderdale ('City')."
...for theatre ('Discipline' 04) in the First Congressional District ('Congressional District of Applicant')."
...from the Madison Art Center ('Applicant') for projects in media arts ('Discipline' 09)."
...from the portion of New York City ('City') that is in the Third Congressional District ('Congressional District of Applicant')."
...awarded more than $2,000 ('Grant Award') for media arts ('Discipline' 09) in Congressional District 2 ('Congressional District of Applicant')."

7. **Select by "Characteristics"** OPTIONAL*

Selection of grant applications according to "Characteristics" of "Actual Individuals Benefiting" or "Actual Artists Participating."

Examples: "Get any applications...
...benefiting children ('Characteristics' C)."
...including senior citizens in its audience ('Characteristics' S)."
...with Native American artists participating ('Characteristics' N)."

8. **Select by "County of Applicant"** OPTIONAL

Selection of grant applications according to "County of Applicant."

Examples: "Get any applications from...
...Dutchess County."
...Fairfax County."
...Winona County."

9. **Select by "Region of Applicant"** OPTIONAL

Selection of grant applications according to "Region of Applicant."

Examples: "Get any applications from ...
... Region IV."
... Region A."
... the Arrowhead Region."

10. **Select by Legislative District of Applicant (House)** OPTIONAL
Select by Legislative District of Applicant (Senate) OPTIONAL

Selection of grant applications according to state legislative house or senate districts.

Examples: "Get any applications from ...
... state House district 32."
... state Senate district 12A."

11. **Select by "Application Number"** OPTIONAL

Selection of grant applications according to "Application Number." Normally one application is associated with each application number, so the selection process would get only one application from stored information.

Examples: "Get
...application #103-79."
...application 334."
...any applications with the number 89."

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12. **Select by "Program"** OPTIONAL

Selection of grant applications according to an agency-defined "Program" code.

Examples: "Get any applications in the...
...Sponsorship Program (e.g., 'Program' S)."
...Evenhart Memorial Concert Series (e.g., 'Program' EMC)."
...Small Grants Program (e.g., 'Program' 4)."
...Museums Program (e.g., 'Program' M)."

13. **Select by "Date Report Due"** OPTIONAL

Selection of grant applications according to "Date Report Due."

Examples: "Get any applications for which the report is due...
...November 3, 1981.
...1/31/82."
...today."
...previous to today (the report is late if it has not been received)."

14. **Select by "Date Report Received"** OPTIONAL

Selection of grant applications according to "Date Report Received."

Examples: "Get any applications for which the report...
...was received before August 13, 1981."
...has not yet been received."

15. **Select by "Status"** OPTIONAL

Selection of grant applications according to an agency-defined "Status" code.

Examples: "Get any applications that are...
...withdrawn (e.g., 'Status' W)."
...ineligible (e.g., 'Status' I)."
...waiting for a panel decision (e.g., 'Status' STEP 3)."
...being processed successfully with no problems (e.g., 'Status' is left blank)."

16. **Select by "Start Date"** OPTIONAL
Select by "End Date" OPTIONAL

Selection of grant applications according to the "Start Date" and "End Date" of the project.

Examples: "Get any applications that...
... start after August 30, 1981."
... are going on during May, 1982, when the governor will be visiting."
... have been completed by today."
... will have been completed by November 10, 1981."

17. **Select by "Type of Activity"** OPTIONAL

Selection of grant applications according to "Type of Activity."

Examples: "Get any applications that are for the funding of...
...a school residency ('Type of Activity' 20)."
...a fellowship ('Type of Activity' 03)."
...an exhibit or exhibitions ('Type of Activity' 06)."

18. **Select by "Provider of Services"** OPTIONAL

Selection of grant applications according to the name of "Provider of Services."

Examples: "Get any applications that include...
...the Metropolitan Museum of Art as the 'Provider of Services.'"
...Texas Opera as the 'Provider of Services.'"

19. **Select by Two or More Fields** OPTIONAL

Selection of grant applications according to two or more fields.

Examples: "Get any applications...
...for a school residency ('Type of Activity' 20) in Wilmington ('City')."
...that were withdrawn (e.g., 'Status' W) from the Individual Artists' Program (e.g., 'Program' IA).
...for music ('Discipline' 02) in district 32A ('Legislative District of Applicant - House')."
...starting in May ('Start Date') in Rock County ('County')."
...that were granted ('Grant Award') less than requested ('Grant Amount Requested') in region 10 ('Region of Applicant')."

Reports

1. Adhesive Labels — NECESSARY

Format: adhesive labels in any size and in any combination (single, three across the page, four across the page, on 8½" x 11" pages, continuous strips, etc.)

Example:

Contact Person
Contact Person Title*
Applicant Name (organization or individual)
Address 1
Address 2
City State ZIP Code

2. Application Report One — NECESSARY

A report of grants management information for general use within agencies.

Format: see Figure 2

Fields:

Label	Possible Field Size
20. Application Number*	9
1. Applicant	N/A
Name (organization or individual)	30
City	16
State	2
7. County of Applicant*	12
11. Region of Applicant*	3
8. Legislative District of Applicant (House)*	3
9. Legislative District of Applicant (Senate)*	3
38. Discipline	3
39. Type of Activity*	2
81. Grant Amount Requested	6
24. Grant Award	6
126. Actual Individuals Benefiting	8
128. Actual Artists Participating*	6

3. Application Report Two — NECESSARY

A report of grants management information for use on a national basis.

Format: see Figure 3

Fields:

Label	Possible Field Size
20. Application Number*	9
1. Applicant	N/A
Name (organization or individual)	30
City	16
State	2
10. Congressional District of Applicant	2
38. Discipline	3
39. Type of Activity*	2
81. Grant Amount Requested	6
24. Grant Award	6
126. Actual Individuals Benefiting	8
128. Actual Artists Participating*	6

*Optional

4. **Project Budget Report** NECESSARY

Format: see Figure 4

Fields:

Label	Possible Field Size
20. Application Number*	9
1. Applicant	N/A
Name (organization or individual)	30
City	16
State	2
38. Discipline	3
39. Type of Activity*	2
81. Grant Amount Requested	6
24. Grant Award	6
100. Actual Total Cash Expenses	8
112. Actual Total In-kind Contributions	8
123. Actual Total Applicant Cash Revenue	8
124. Grant Amount Spent	6
125. Actual Total Cash Revenue	8

Figure 2

Application Report One

Arts Agency**

00 / 00 / 00 **

Number**	Name City	State	County* Region*	House* Senate*	Disc. Type*	Request	Award	Indiv.	Artists*
	TOTAL								

(continued)

* Optional

** It is assumed that each report will include the art agency's name and the date.

Figure 3

Application Report Two

Arts Agency*
00 / 00 / 00*

Number**	Name City	State	District	Disc. Type**	Request	Award	Indiv.	Artists**
	TOTAL							

Figure 4

Project Budget Report

Arts Agency*
00 / 00 / 00*

Number**	Name City	State	Disc. Type**	Request Award	Expenses	In-kind Contrib.	Revenue	Grant Spent	Total Revenue
	TOTAL								

*It is assumed that each report will include the arts agency's name and the date.
**Optional

Arts Resource Directory Systems

Exhibitions, Shows, and Festivals

Fields

Label	Type Required	Need	Possible Field Size
1. Name of Show	Text	Optional	35

Note: It is understood that to insure a resource directory's maximum effectiveness an agency may *require* information in every occurrence of certain fields (such as "Name of Show," "Presenting Organization," and "Contact Person"). However, because resource directories are themselves optional—that is, they contain information which state and regional arts agencies *may* provide according to their needs but are not required to provide—these fields are Optional according to the National Standard.

2. Presenting Organization	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
3. Nonprofit Status	Yes or No	Optional	1
4. Contact Person	Text	Optional	20
5. Contact Person Telephone	Numeric	Optional	12
6. Time	Numeric	Optional	10
7. Start Date	Date	Optional	6
8. End Date	Date	Optional	6
9. Deadline for Entry	Date	Optional	6
10. Type of Space	Numeric	Optional	1
11. Location	Text	Optional	1
12. City	Text	Optional	16
13. County	Numeric or Text	Optional	12
14. Region	Numeric or Text	Optional	3
15. State	Text	Optional	2
16. Discipline	Numeric	Optional	3
17. Eligibility	Numeric	Optional	1
18. Entry Fee	Numeric	Optional	6
19. Projected Number of Entries	Numeric	Optional	6
20. Previous Number of Entries	Numeric	Optional	6
21. Prizes	Numeric	Optional	1
22. Commission	Numeric	Optional	3

Definitions

1. **Name of Show**
   The popular name or title of an exhibition / show / festival.

2. **Presenting Organization**
   The name and address of the individual, organization, business, etc., presenting the exhibition / show / festival.

Include one Constituent as defined in the Constituent List.

---

3. **Nonprofit Status**
   Does "Presenting Organization" have nonprofit status (i.e., no part of the income or assets inure to the benefit of any director, officer, or employee except as salary or reasonable compensation for services and travel expenses)? Yes or No.

4. **Contact Person**
   The person to contact for additional information about exhibition / show / festival.

5. **Contact Person Telephone**
   The daytime telephone number of "Contact Person."

6. **Time**
   Time of exhibition / show / festival (e.g., 10:30 - 5:00).

7. **Start Date**
   The first date of exhibition / show / festival.

8. **End Date**
   The last date of exhibition / show / festival.

9. **Deadline for Entry**
   The last date on which artists, performing groups, exhibitors, etc., can enter exhibition / show / festival.

10. **Type of Space**
    The type of space available for exhibition / show / festival. The following code will be used:
    1 auditorium
    2 gallery
    3 outdoor
    4 outdoor-covered
    5 other space
    6 combination

11. **Location**
    Name of the building or site of exhibition / show / festival.

12. **City**
    Post office address of "Location."

13. **County**
    County or parish of "Location."

14. **Region**
    Sub-state region of "Location."

15. **State**
    State of "Location."

16. **Discipline**
The primary arts discipline represented in exhibition / show / festival. The following code will be used: (see pp.116-117 for definitions)

Note: It is understood that an agency can elect to use main discipline categories only (e.g., Dance, Music, Theatre) and not sub-categories (e.g., mime, musical theatre, puppet). Also note that "Humanities" is listed for use by agencies which serve both the arts and humanities.

01 Dance
- A ballet*
- B ethnic / folk / jazz*
- C modern*

02 Music
- A band* (do not include jazz or popular)
- B chamber*
- C choral*
- D contemporary* (include experimental, electronic)
- E ethnic / folk*
- F jazz*
- G popular* (include rock)
- H solo / recital*
- I symphonic*

03 Opera

04 Theatre
- A theatre - general* (include classical, contemporary, experimental)
- B mime*
- C musical theatre*
- D puppet*
- E theatre for young audiences*

05 Visual Arts
- A conceptual art*
- B graphics*
- C inter-media*
- D painting*
- E performance art*
- F sculpture*

06 Architecture / Design

07 Crafts

08 Photography

09 Media Arts
- A film*
- B radio*
- C television*
- D video* (include holography)

10 Literature

11 Community Arts

12 Folk Arts

13 Humanities

14 Multi-disciplinary

15 Non-arts / Non-humanities

17. **Eligibility**
Entrance eligibility for exhibition / show / festival. The following code will be used:
1 invitational
2 open
3 juried
4 members only

18. **Entry Fee**
The dollar amount of entry fee including booth fee, if any, to exhibition / show / festival. Enter 0 if none.

19. **Projected Number of Entries**
Maximum number of entries projected for current exhibition / show / festival. Enter 0 if none.

20. **Previous Number of Entries**
Number of entries in previous exhibition / show / festival. Enter 0 if none.

21. **Prizes**
Prizes awarded at exhibition / show / festival. The following code will be used:
1 money
2 purchase awards
3 ribbons
4 other
5 none

22. **Commission**
The percent of sales commission for exhibition / show / festival. Enter 0 if none.

*Optional

Performing Arts Facilities

Fields

Label	Type Required	Need	Possible Field Size
1. Space	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10

Note: It is understood that to insure a resource directory's maximum effectiveness an agency may *require* information in every occurrence of certain fields (such as "Space" and "Contact Person"). However, because resource directories are themselves optional—that is they contain information which state and regional arts agencies *may* provide according to their needs but are not required to provide—these fields are Optional according to the National Standard.

2. Box Office Telephone	Numeric	Optional	12
3. Backstage Telephone	Numeric	Optional	12
4. Contact Person	Text	Optional	20
5. Contact Person Title	Text	Optional	20
6. Contact Person Office Telephone	Numeric	Optional	12
7. Contact Person Home Telephone	Numeric	Optional	12
8. Affiliation / Ownership	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
9. County	Text	Optional	12
10. Region	Text	Optional	3
11. Type of Space (performing arts)	Numeric	Optional	2
12. Union Musicians	Yes or No	Optional	1
13. Union Stagehands	Yes or No	Optional	1
14. Trained Crew Available	Yes or No	Optional	1
15. Permanent Seating	Numeric	Optional	6
16. Additional Seating	Numeric	Optional	6
17. Stage Type	Numeric	Optional	1
18. Depth of Stage	Numeric	Optional	3
19. Playing Area Width	Numeric	Optional	3
20. Stage Playing Area Size	Numeric	Optional	6
21. Additional Playing Area Size	Numeric	Optional	6

22. Grid Height	Numeric	Optional	3
23. Orchestra Pit Size	Numeric	Optional	6
24. Stage Floor Type	Numeric	Optional	1
25. Marley-type Floor Available	Yes or No	Optional	1
26. Fly System Type	Numeric	Optional	1
27. Total Number of Lines	Numeric	Optional	1
28. Number of Dead-hung Lines	Numeric	Optional	3
29. Drapery	Yes or No	Optional	1
30. Light Board Type	Numeric	Optional	1
31. Accommodates Portable Light Board	Yes or No	Optional	1
32. Lighting Instruments Available	Numeric	Optional	3
33. Number of Follow Spots Available	Numeric	Optional	2
34. Sound System Available	Yes or No	Optional	1
35. Piano Type	Numeric	Optional	1
36. Organ Type	Numeric	Optional	1
37. Regular Dressing Rooms Capacity	Numeric	Optional	3
38. Other Dressing Areas Capacity	Numeric	Optional	3
39. Backstage Loading Dock	Yes or No	Optional	1
40. Accessibility	Yes or No	Optional	1

Definitions

1. **Space**
   The name and address of a performing arts facility.

   Include one Constituent as defined in the Constituent List.

2. **Box Office Telephone**
   The box office telephone number of "Space."
3. **Backstage Telephone**
   The backstage telephone number of "Space."
4. **Contact Person**
   The person to contact for additional information about "Space."
5. **Contact Person Title**
   The official title of "Contact Person."
6. **Contact Person Office Telephone**
   The daytime telephone number of "Contact Person."
7. **Contact Person Home Telephone**
   The telephone number where "Contact Person" can be reached during non-business hours.
8. **Affiliation / Ownership**
   The organization, if not the same as "Space," which is the primary affiliate or owner of "Space."

   Include one Constituent as defined in the Constituent List.

9. **County**
   The county or parish in which "Space" is located.
10. **Region**
    The sub-state region in which "Space" is located.

(continued)

11. **Type of Space** (performing arts)
The type of performing arts facility listed in "Space." The following code will be used:
01 traditional proscenium theatre with loft space
02 traditional proscenium theatre without loft space
03 proscenium theatre convertible to thrust stage
04 thrust stage theatre
05 arena stage theatre
06 flexible black box theatre
07 multi-purpose auditorium with fly loft space
08 multi-purpose auditorium with stage but no fly loft space
09 lecture hall with permanent stage
10 cafetorium
11 gymnatorium
12 meeting or convention hall or sports arena with permanent stage
13 hotel ballroom with permanent stage
14 restaurant or nightclub with permanent stage
15 outdoor amphitheatre or concert shell
16 outdoor bandstand
17 fairground grandstand
18 recital hall
19 other

12. **Union Musicians**
Is "Space" required to use its own union musicians? Yes or No.

13. **Union Stagehands**
Is "Space" required to use its own union stagehands? Yes or No.

14. **Trained Crew Available**
Is trained crew available for setting up and working shows? Yes or No.

15. **Permanent Seating**
The number of seats permanently installed in "Space." Enter 0 if none.

16. **Additional Seating**
The number of additional seats that are available and may be set up in "Space." Enter 0 if none.

17. **Stage Type**
The type of stage available in "Space." The following code will be used:
1 proscenium
2 thrust
3 arena
4 flexible
5 other

18. **Depth of Stage** (proscenium or thrust "Stage Type" only)
The depth in feet from plaster line (a line drawn across the stage at the upstage edge of the proscenium) to back wall, if proscenium; if thrust, depth from downstage center to back wall. If arena, flexible, or other "Stage Type," enter 0.

19. **Playing Area Width** (proscenium or thrust "Stage Type" only)
If proscenium, the width in feet of proscenium opening; if thrust, the width in feet from stage left to stage right; do not include wing space. If arena, flexible or other "Stage Type," enter 0.

20. **Stage Playing Area Size**
The area in square feet of total stage playing area. For proscenium and thrust "Stage Type," "Stage Playing Area Size" = "Depth of Stage" (Field 18) × "Playing Area Width" (Field 19) + "Additional Playing Area Size" (Field 21).

21. **Additional Playing Area Size**
The area in square feet of additional adjacent playing areas.

22. **Grid Height**
The height in feet of the metal grid just below proscenium, thrust, or arena stage roof.

23. **Orchestra Pit Size**
The linear feet measurements from which orchestra pit's area in square feet can be calculated (i.e., _____' × _____').

24. **Stage Floor Type**
The type of floor on the main playing area. The following code will be used:
1 sprung wood
2 concrete
3 tile on concrete
4 tile on wood
5 wood on concrete
6 carpet on wood
7 carpet on concrete
8 other

25. **Marley-type Floor Available**
Does "Space" have or have access to a Marley-type floor? Yes or No.

26. **Fly System Type**
The type of fly system. The following code will be used:
1 counterweight
2 hemp
3 manual winch
4 electric winch
5 other
6 none

27. **Total Number of Lines**
The total number of lines available for hanging. Enter 0 if none.

28. **Number of Dead-hung Lines**
The total number of dead-hung lines. Enter 0 if none.

29. **Drapery**
Does "Space" have black velour or other type of curtains, legs, borders, and/or cycs? Yes or No.

30. **Light Board Type**
The type of light board. The following code will be used:
1 autotransformer
2 computermemory
3 electronic
4 resistance
5 other

31. **Accommodates Portable Light Board**
Is "Space" equipped to provide power and space for portable light boards? Yes or No.

32. **Lighting Instruments Available**
The number of lighting instruments (such as Lekos and Fresnels) in "Space." Enter 0 if none.

33. **Number of Follow Spots Available**
The total number of follow spots available. Enter 0 if none.

34. **Sound System Available**
Does "Space" have sound system available? Yes or No.

35. **Piano Type**
The type of tuned piano available. The following code will be used:
1 grand
2 upright
3 none

36. **Organ Type**
The type of tuned organ available. The following code will be used:
1 electronic
2 pipe
3 none

(continued)

37. **Regular Dressing Rooms Capacity**
The number of people who can be accommodated in dressing rooms equipped with mirrors, make-up lights, sinks, and racks. If no dressing rooms in "Space," enter 0.

38. **Other Dressing Areas Capacity**
The number of people who can be accommodated in other dressing areas located backstage or near backstage of "Space." If no other dressing areas, enter 0.

39. **Backstage Loading Dock**
Does "Space" have a backstage loading dock at stage level? Yes or No.

40. **Accessibility**
Does "Space" meet accessibility criteria of Section 504 of the Rehabilitation Act of 1973? Yes or No.

Visual Arts Facilities

Fields

Label	Type Required	Need	Possible Field Size
1. Space	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10

Note: It is understood that to insure a resource directory's maximum effectiveness an agency may *require* information in every occurrence of certain fields (such as "Space" and "Contact Person"). However, because resource directories are themselves optional – that is they contain information which state and regional arts agencies *may* provide according to their needs but are not required to provide – these fields are Optional according to the National Standard.

2. Contact Person	Text	Optional	20
3. Contact Person Title	Text	Optional	20
4. Contact Person Office Telephone	Numeric	Optional	12
5. Contact Person Home Telephone	Numeric	Optional	12
6. Affiliation / Ownership	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
7. County	Text	Optional	12
8. Region	Text	Optional	3

9. Type of Space (visual arts)	Numeric	Optional	2
10. Meeting Rooms for Films	Numeric	Optional	1
11. Workshop Spaces	Numeric	Optional	1
12. Security	Numeric	Optional	1
13. Temperature Control	Yes or No	Optional	1
14. Humidity Control	Yes or No	Optional	1
15. Galleries for Temporary Exhibitions	Numeric	Optional	3
16. Running Feet for Temporary Exhibitions	Numeric	Optional	6
17. Square Feet for Temporary Exhibitions	Numeric	Optional	6
18. Nails Allowed in Wall	Yes or No	Optional	1
19. Channeling or Hanging Molding	Yes or No	Optional	1
20. Works Suspended from Ceiling	Yes or No	Optional	1
21. Type of Lighting	Numeric	Optional	1
22. Portable Display Panels	Numeric	Optional	2
23. Sculpture Bases or Pedestals	Numeric	Optional	2
24. Display Cases	Numeric	Optional	2
25. Trained Staff Available	Yes or No	Optional	1
26. Accessibility	Yes or No	Optional	1

Definitions

1. **Space**
   The name and address of a visual arts facility.

   Include one Constituent as defined in the Constituent List.

2. **Contact Person**
   The person to contact for additional information about "Space."
3. **Contact Person Title**
   The official title of "Contact Person."
4. **Contact Person Office Telephone**
   The daytime telephone number of "Contact Person."
5. **Contact Person Home Telephone**
   A telephone number where "Contact Person" can be reached during non-business hours.
6. **Affiliation / Ownership**
   The organization, if not the same as "Space," which is the primary affiliate or owner of "Space."

   Include one Constituent as defined in the Constituent List.

7. **County**
   The county or parish in which "Space" is located.
8. **Region**
   The sub-state region in which "Space" is located.

(continued)

9. **Type of Space (visual arts)**
The type of visual arts facility listed in "Space." The following code will be used:
01 commercial art gallery
02 gallery in art museum
03 gallery in business building
04 gallery in community arts center
05 gallery in historical museum
06 gallery in library
07 gallery in school / college / university
08 gallery in other public building
09 lobby in public building
10 shopping center or mall
11 other

10. **Meeting Rooms for Films**
The number of meeting rooms or spaces available in "Space" for showing film / slide presentations. Enter 0 if none.

11. **Workshop Spaces**
The number of spaces available in "Space" for conducting workshops. Enter 0 if none.

12. **Security**
"Space" can accommodate exhibitions with the following security requirements (use maximum). The National Standard uses definitions obtained from the Smithsonian Institution Traveling Exhibition Service (SITES); see Note, pp.151-152.
1 high security
2 moderate security
3 limited security
4 none of the above

13. **Temperature Control**
Does "Space" have a temperature control system? Yes or No.

14. **Humidity Control**
Does "Space" have a humidity control system? Yes or No.

15. **Galleries for Temporary Exhibitions**
The number of separate spaces available in "Space" for temporary exhibitions. Enter 0 if none.

16. **Running Feet for Temporary Exhibitions**
The number of running feet of wall in the "Galleries for Temporary Exhibitions." Enter 0 if none.

17. **Square Feet for Temporary Exhibitions**
The number of square feet of *floor space* in the "Galleries for Temporary Exhibitions." Enter 0 if none.

18. **Nails Allowed in Wall**
May nails, etc., be driven into wall surface? Yes or No.

19. **Channeling or Hanging Molding**
Are walls equipped with channeling or hanging molding? Yes or No.

20. **Works Suspended from Ceiling**
May art works be suspended from ceiling? Yes or No.

21. **Type of Lighting**
The type of lighting available in "Space." The following code will be used:
1 fluorescent
2 incandescent
3 natural
4 track
5 other

22. **Portable Display Panels**
The number of portable display panels available in "Space." Enter 0 if none.

23. **Sculpture Bases or Pedestals**
The number of bases or pedestals available in "Space" for sculpture display. Enter 0 if none.

24. **Display Cases**
The number of display cases available in "Space." Enter 0 if none.

25. **Trained Staff Available**
Is trained staff available to install exhibits? Yes or No.

26. **Accessibility**
Does "Space" meet accessibility criteria of Section 504 of the Rehabilitation Act of 1973? Yes or No.

Note

The following security requirements definitions are from page 10 of *Update 1980-81. Update* is an annual publication of the Smithsonian Institution Traveling Exhibition Service (SITES, Washington, D.C. 20560, 202-357-3168). They are reprinted with permission from SITES for use in the National Standard Visual Arts Facilities Resource Directory System as definitions for the code items in Field 12.

High Security

High security is required for exhibitions containing articles which are highly valuable, sensitive to light, humidity, and temperature. This includes original material, art, and antiques; especially paper, wood, and textiles, gold, silver, other precious metals, jewels, archaeological treasures, and other highly valuable articles.

The following conditions must be met by organizations desiring to exhibit *high security* exhibitions:

Space
—Museum or limited access gallery. An open mall, hallway, or lounge area is *not* acceptable.

Protection
—Trained, professional guards in sufficient number to adequately protect objects. Guards need not be armed.
—Night guards and/or electronic system.
—Provisions to prevent the public from touching wall-hung objects through an appropriate hanging system, the use of stanchions, platforms, and/or guard supervision.
—Locked glass cases for small objects. Plexiglas cases are *not* acceptable for *high security* exhibitions...
—Handling of objects by curator or registrar, or equivalent museum professional.

Environmental Controls
—Temperature and light control are required for all exhibits in this category. Humidity control is required for certain exhibitions.
—Fire system, and other fire protection devices according to local ordinances.

Moderate Security

Moderate security is required for most...exhibitions which contain original art works, prints and graphics, original specimens, artifacts, or original photographs.

The following conditions must be met by organizations desiring to exhibit *moderate security* exhibitions:

Space
—Limited access, gallery-type area. An open mall, hallway, or lounge area is *not* acceptable.

Protection
—Professional guards or other trained persons whose sole duty is the supervision of the exhibition.
—Locked glass cases or secure Plexiglas cases for small objects. Plexiglas must be screwed to wall or base cabinet, not just rested on top of unit.
—Exhibit area must be locked and secure during closing hours. Alarm and/or guards during night hours are preferred but not required.
—Handling of objects, if not actually by registrar or curator, must be by a preparator, exhibits technician, or other person trained in handling museum objects.

Environmental Controls
—Temperature and light control are required. Humidity control is desired.
—Fire protection according to local ordinance.

(continued)

Limited Security

Limited security is the minimum security required for certain exhibitions. These exhibitions include panel exhibitions containing no original material or artifacts, and some photography and children's art shows which are considered less of a security risk.

The following conditions must be met by organizations desiring to exhibit *limited security* exhibitions:

Space
- —Shows may be exhibited in a gallery or lounge area, preferably not in a hallway....

Protection
- —Supervision by guard, volunteer, student or receptionist. Someone must be in the room with the exhibition at all times and may be performing other duties as well as watching the exhibition....
- —Exhibit area must be locked and secure during closing hours.

Environmental Controls
- —Direct sunlight should be diffused or eliminated to prevent fading of panels and photographs.
- —Fire protection according to local ordinance.

Individuals in the Performing and Literary Arts

Fields

Label	Type Required	Need	Possible Field Size
1. Individual	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10

Note: It is understood that to insure a resource directory's maximum effectiveness an agency may *require* information in every occurrence of certain fields (such as "Individual"). However, because resource directories are themselves optional—that is they contain information which state and regional arts agencies *may* provide according to their needs but are not required to provide—these fields are Optional according to the National Standard.

2. Home Telephone	Numeric	Optional	12
3. Other Telephone	Numeric	Optional	12
4. Institution / Affiliation	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
5. County	Text	Optional	12
6. Region	Numeric or Text	Optional	3
7. Discipline	Numeric	Optional	3

8. Type	Numeric	Optional	2

Note: It is understood that agencies may wish to collect specific information on the "Types of Services" provided by the "Individual" in this resource directory. Such a field is not included in the National Standard because of the unique nature of each agency's information requirements and minimal need for national compatibility of such information.

9. Booking Agent	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
10. Booking Agent Telephone	Numeric	Optional	12
11. Audience Type	Numeric	Optional	6
12. Characteristics	Numeric	Optional	6

Note: It is common for arts agencies to record fees and rates charged by individual artists. However, rates are usually negotiable and vary by services performed, dates, and block-booking. It may be appropriate for certain agencies to keep such information for specific programmatic needs, but fields are not included here because of their limited usefulness to all arts agencies and the lack of need for compatibility among agencies.

Definitions

1. **Individual**

   Include one Constituent as defined in the Constituent List.

2. **Home Telephone**
   The home telephone number of "Individual."

3. **Other Telephone**
   Another telephone number of "Individual."

4. **Institution / Affiliation**
   The institution, if any, with which "Individual" is affiliated.

   Include one Constituent as defined in the Constituent List.

5. **County**
   The county or parish of "Individual's" residence.

6. **Region**
   The sub-state region of "Individual's" residence.

(continued)

7. Discipline

The arts discipline in which "Individual" is involved. The following code will be used: (see pp.116-117 for definitions)

Note: It is understood that an agency can elect to use main discipline categories only (e.g., Dance, Music, Theatre) and not sub-categories (e.g., mime, musical theatre, puppet). Also note that "Humanities" is listed for use by agencies which serve both the arts and humanities.

01 Dance
- A ballet*
- B ethnic / folk / jazz*
- C modern*

02 Music
- A band* (do not include jazz or popular)
- B chamber*
- C choral*
- D contemporary* (include experimental, electronic)
- E ethnic / folk*
- F jazz*
- G popular* (include rock)
- H solo / recital*
- I symphonic*

03 Opera

04 Theatre
- A theatre - general* (include classical, contemporary, experimental)
- B mime*
- C musical theatre*
- D puppet*
- E theatre for young audiences*

05 Visual Arts
- A conceptual art*
- B graphics*
- C inter-media*
- D painting*
- E performance art*
- F sculpture*

06 Architecture / Design

07 Crafts

08 Photography

09 Media Arts
- A film*
- B radio*
- C television*
- D video* (include holography)

10 Literature

11 Community Arts

12 Folk Arts

13 Humanities

14 Multi-disciplinary

15 Non-arts / Non-humanities

8. Type

The type of "Individual." The following code will be used:

01 choreographer
02 dancer
03 composer
04 conductor
05 brass player
06 fretted instrument player
07 keyboard instrumentalist
08 percussionist
09 string player
10 singer
11 woodwind player
12 actor
13 mime
14 puppeteer
15 artistic director
16 technical director
17 set / property designer
18 costume designer
19 lighting designer
20 makeup designer
21 carpenter
22 property technician
23 wardrobe technician
24 lighting technician
25 sound technician
26 production manager
27 stage manager
28 writer / poet
29 playwright
30 other

9. Booking Agent

The person or organization, if other than "Individual," who arranges "Individual's" bookings and serves as a contact for prospective sponsors.

Include one Constituent as defined in the Constituent List

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10. Booking Agent Telephone

The telephone number of "Booking Agent."

*Optional

11. Audience Type
The type(s) of audience(s) for which "Individual's" programs are appropriate. The following code will be used:

Note: Unlike other National Standard codes, several of these code categories may apply in any given case. Therefore, all applicable codes should be selected (e.g., a Native American audience of deaf eleventh graders would be coded "NYD"). Any categories needed by an agency but not available here (e.g., French American, rural, preschool, summer resident, etc.) can be added, but it must be understood that these categories would be used *in addition to* and *not instead of* the National Standard (e.g., a French American audience would be coded as such in addition to "W - White, not Hispanic").

- N American Indian / Alaskan Native*
- A Asian / Pacific Islander*
- B Black, not Hispanic*
- H Hispanic*
- W White, not Hispanic*
- G general
- C child
- Y secondary school student
- U college / university student
- S senior citizen
- E emotionally and mentally disabled
- P physically disabled
- D hearing impaired
- Q visually impaired
- I institutionalized
- V veteran
- F woman

12. Characteristics
Descriptors designed to enable an agency to identify "Individual," Field 1, according to that person's characteristics. See Field 11 for code.

Individuals in the Visual and Media Arts

Fields

Label	Type Required	Need	Possible Field Size
1. Visual / Media Artist	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10

Note: It is understood that to insure a resource directory's maximum effectiveness an agency may *require* information in every occurrence of certain fields (such as "Visual / Media Artist"). However, because resource directories are themselves optional—that is they contain information which state and regional arts agencies *may* provide according to their needs but are not required to provide—these fields are Optional according to the National Standard.

2. Home Telephone	Numeric	Optional	12
3. Other Telephone	Numeric	Optional	12

(continued)

*See footnote on p.134.

4. Institution / Affiliation	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
5. County	Text	Optional	12
6. Region	Numeric or Text	Optional	3
7. Discipline	Numeric	Optional	3
8. Type of Artist	Numeric	Optional	2

Note: It is understood that agencies may wish to collect specific information on the "Types of Services" provided by the "Visual / Media Artist" in this resource directory. Such a field is not included in the National Standard because of the unique nature of each agency's information requirements and minimal need for national compatibility of such information.

9. Agent	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
10. Agent Telephone	Numeric	Optional	12
11. Audience Type	Numeric	Optional	6
12. Characteristics	Numeric	Optional	6

Note: It is common for arts agencies to record fees and rates charged by individual artists. However, rates are usually negotiable and vary by services performed, dates, and block-booking. It may be appropriate for certain agencies to keep such information for specific programmatic needs, but fields are not included here because of their limited usefulness to all arts agencies and the lack of need for compatibility among agencies.

Definitions

1. **Visual / Media Artist**

   Include one Constituent as defined in the Constituent List.

2. **Home Telephone**
   The home telephone number of "Visual / Media Artist."

3. **Other Telephone**
   Another telephone number of "Visual / Media Artist."

4. **Institution / Affiliation**
   The institution, if any, with which "Visual / Media Artist" is affiliated.

   Include one Constituent as defined in the Constituent List.

5. **County**
   The county or parish of "Visual / Media Artist's" residence.

6. **Region**
   The sub-state region of "Visual / Media Artist's" residence.

7. Discipline

The arts discipline in which "Visual / Media Artist" is involved. The following code will be used: (see pp.116-117 for definitions)

Note: It is understood that an agency can elect to use main discipline categories only (e.g., Dance, Music, Theatre) and not sub-categories (e.g., mime, musical theatre, puppet). Also note that "Humanities" is listed for use by agencies which serve both the arts and humanities.

01 Dance
- A ballet*
- B ethnic / folk / jazz*
- C modern*

02 Music
- A band* (do not include jazz or popular)
- B chamber*
- C choral*
- D contemporary* (include experimental, electronic)
- E ethnic / folk*
- F jazz*
- G popular* (include rock)
- H solo / recital*
- I symphonic*

03 Opera

04 Theatre
- A theatre - general* (include classical, contemporary, experimental)
- B mime*
- C musical theatre*
- D puppet*
- E theatre for young audiences*

05 Visual Arts
- A conceptual art*
- B graphics*
- C inter-media*
- D painting*
- E performance art*
- F sculpture*

06 Architecture / Design

07 Crafts

08 Photography

09 Media Arts
- A film*
- B radio*
- C television*
- D video* (include holography)

10 Literature

11 Community Arts

12 Folk Arts

13 Humanities

14 Multi-disciplinary

15 Non-arts / Non-humanities

8. Type of Artist

The type of "Visual / Media Artist." The following code will be used:

01 architect / designer - include landscape architects and urban, interior, fashion designers, etc.

02 graphic designer - working primarily with type (e.g., designers of brochures, letterheads, posters, etc.)

03 graphic artist - include artists who do pen and ink drawing, pencil drawing, watercolor, monoprint, cartoons, illustrations, calligraphy, collage, pastel, prints (including silk-screen, etchings, engravings, lithographs, intaglio, embossing, etc.), etc.

04 painter - do not include watercolor; see "graphic artist," 03, for watercolor

05 sculptor

06 photographer

07 filmmaker

08 video artist - include holographic artist

09 ceramist - one who creates art by firing nonmetallic minerals (e.g., clay, porcelain) at high temperatures; include potters

10 glassblower

11 stained glass artist

12 mosaic artist

13 enamelist

14 metalsmith - include goldsmith, silversmith, blacksmith

15 leatherworker

16 fiber artist - include spinning, dyeing, weaving, basketry, stitchery, quilting, patchwork, applique, batik, tapestry, rugmaking, macrame, lacemaking, knitting, crocheting, etc.

(continued)

*Optional

17 woodworker - include cabinetmaker, woodcarver, instrument maker, etc.
18 papermaker
19 printer / binder / typographer
20 conceptual artist - one who creates works in which the medium is the concept itself and in which the "process" is more important than the conclusion
21 performance artist - one who creates visual art using his or her own physical presence, often in a visual arts context and usually working alone
22 inter-media artist - one who creates works of art in which music, dance, video, and film are integrated into a total concept (e.g., a fluid living sculpture using more than one person)
23 other

9. Agent

The person, gallery, or other organization, if other than "Visual / Media Artist," which serves as "Visual / Media Artist's" contact for sales, exhibitions, services, information, etc.

Include one Constituent as defined in the Constituent List.

10. Agent Telephone

The telephone number of "Agent."

11. Audience Type

The type(s) of audience(s) for which "Visual / Media Artist's" programs are appropriate. The following code will be used:

Note: Unlike other National Standard codes, several of these code categories may apply in any given case. Therefore, all applicable codes should be selected (e.g., a Native American audience of deaf eleventh graders would be coded "NYD"). Any categories needed by an agency but not available here (e.g., French American, rural, preschool, summer resident, etc.) can be added, but it must be understood that these categories would be used *in addition to* and *not instead of* the National Standard (e.g., a French American audience would be coded as such in addition to "W - White, not Hispanic").

N American Indian / Alaskan Native*
A Asian / Pacific Islander*
B Black, not Hispanic*
H Hispanic*
W White, not Hispanic*

G general

C child
Y secondary school student

U college / university student
S senior citizen

E emotionally and mentally disabled
P physically disabled
D hearing impaired
Q visually impaired

I institutionalized
V veteran
F woman

12. Characteristics

Descriptors designed to enable an agency to identify "Visual / Media Artist," Field 1, according to that person's characteristics. See Field 11 for code.

*See footnote on p.134.

Performing Arts Organizations

Fields

Label	Type Required	Need	Possible Field Size
1. Organization	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10

Note: It is understood that to insure a resource directory's maximum effectiveness an agency may *require* information in every occurrence of certain fields (such as "Organization"). However, because resource directories are themselves optional—that is they contain information which state and regional arts agencies *may* provide according to their needs but are not required to provide—these fields are Optional according to the National Standard.

2. Nonprofit Status	Yes or No	Optional	1
3. Artistic Director	Text	Optional	20
4. Artistic Director Title	Text	Optional	20
5. Artistic Director Telephone	Numeric	Optional	12
6. Administrator	Text	Optional	20
7. Administrator Title	Text	Optional	20
8. Administrator Telephone	Numeric	Optional	12
9. Booking Agent	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
10. Booking Agent Telephone	Numeric	Optional	12
11. County	Text	Optional	12
12. Region	Numeric or Text	Optional	3

Note: Further specification allowing an agency to select particular types of performing arts organizations will be available if this resource directory is cross-referenced to the National Standard Mailing List System "Mail Code." If a concurrent mailing list system is not available, an "Organization Type" code would be appropriate here.

13. Discipline	Numeric	Optional	3

Note: It is understood that agencies may wish to collect specific information on the "Types of Services" provided by the "Organization" in this resource directory. Such a field is not included in the National Standard because of the unique nature of each agency's information requirements and minimal need for national compatibility of such information.

14. Audience Type	Numeric	Optional	6

Definitions

1. **Organization**
   The name and address of a performing arts organization.

   Include one Constituent as defined in the Constituent List.

2. **Nonprofit Status**
   Does "Organization" have nonprofit status (i.e., no part of the income or assets inure to the benefit of any director, officer, or employee except as salary or reasonable compensation for services and travel expenses)? Yes or No.

3. **Artistic Director**
   The person with immediate responsibility for the artistic activities of "Organization."

4. **Artistic Director Title**
   The official title of "Artistic Director."

5. **Artistic Director Telephone**
   The daytime telephone number of "Artistic Director."

6. **Administrator**
   The person with immediate responsibility for the administration of "Organization."

7. **Administrator Title**
   The official title of "Administrator."

8. **Administrator Telephone**
   The daytime telephone number of "Administrator."

9. **Booking Agent**
   The person or organization, if other than "Administrator," who arranges "Organization's" bookings and serves as a contact for prospective sponsors.

   Include one Constituent as defined in the Constituent List.

10. **Booking Agent Telephone**
    The telephone number of "Booking Agent."

11. **County**
    The county or parish in which "Organization's" principal place of business is located.

12. **Region**
    The sub-state region in which "Organization's" principal place of business is located.

13. Discipline

The arts discipline in which "Organization" is involved. The following code will be used:
(see pp.116-117 for definitions)

Note: It is understood that an agency can elect to use main discipline categories only (e.g., Dance, Music, Theatre) and not sub-categories (e.g., mime, musical theatre, puppet). Also note that "Humanities" is listed for use by agencies which serve both the arts and humanities.

- 01 Dance
  - A ballet*
  - B ethnic / folk / jazz*
  - C modern*
- 02 Music
  - A band* (do not include jazz or popular)
  - B chamber*
  - C choral*
  - D contemporary* (include experimental, electronic)
  - E ethnic / folk*
  - F jazz*
  - G popular* (include rock)
  - H solo / recital*
  - I symphonic*
- 03 Opera
- 04 Theatre
  - A theatre - general* (include classical, contemporary, experimental)
  - B mime*
  - C musical theatre*
  - D puppet*
  - E theatre for young audiences*
- 05 Visual Arts
  - A conceptual art*
  - B graphics*
  - C inter-media*
  - D painting*
  - E performance art*
  - F sculpture*
- 06 Architecture / Design
- 07 Crafts
- 08 Photography
- 09 Media Arts
  - A film*
  - B radio*
  - C television*
  - D video* (include holography)
- 10 Literature
- 11 Community Arts
- 12 Folk Arts
- 13 Humanities
- 14 Multi-disciplinary
- 15 Non-arts / Non-humanities

14. Audience Type

The type(s) of audience(s) for which "Organization's" programs are appropriate. The following code will be used:

Note: Unlike other National Standard codes, several of these code categories may apply in any given case. Therefore, all applicable codes should be selected (e.g., a Native American audience of deaf eleventh graders would be coded "NYD"). Any categories needed by an agency but not available here (e.g., French American, rural, preschool, summer resident, etc.) can be added, but it must be understood that these categories would be used *in addition to* and *not instead of* the National Standard (e.g., a French American audience would be coded as such in addition to "W - White, not Hispanic").

- N American Indian / Alaskan Native**
- A Asian / Pacific Islander**
- B Black, not Hispanic**
- H Hispanic**
- W White, not Hispanic**
- G general
- C child
- Y secondary school student
- U college / university student
- S senior citizen
- E emotionally and mentally disabled
- P physically disabled
- D hearing impaired
- Q visually impaired
- I institutionalized
- V veteran
- F woman

*Optional
**See footnote on p.134.

Visual Arts Organizations

Fields

Label	Type Required	Need	Possible Field Size
1. Organization	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10

Note: It is understood that to insure a resource directory's maximum effectiveness an agency may *require* information in every occurrence of certain fields (such as "Organization"). However, because resource directories are themselves optional – that is they contain information which state and regional arts agencies *may* provide according to their needs but are not required to provide – these fields are Optional according to the National Standard.

2. Nonprofit Status	Yes or No	Optional	1
3. Contact Person	Text	Optional	20
4. Contact Person Title	Text	Optional	20
5. Contact Person Telephone	Numeric	Optional	12
6. Administrator	Text	Optional	20
7. Administrator Title	Text	Optional	20
8. Administrator Telephone	Numeric	Optional	12
9. Agent	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
10. Agent Telephone	Numeric	Optional	12
11. County	Text	Optional	12
12. Region	Numeric or Text	Optional	3

Note: Further specification allowing an agency to select particular types of visual arts organizations will be available if this resource directory is cross-referenced to the National Standard Mailing List System "Mail Code." If a concurrent mailing list system is not available, an "Organization Type" code would be appropriate here.

13. Discipline	Numeric	Optional	3

Note: It is understood that agencies may wish to collect specific information on the "Types of Services" provided by the "Organization" in this resource directory. Such a field is not included in the National Standard because of the unique nature of each agency's information requirements and minimal need for national compatibility of such information.

14. Audience Type	Numeric	Optional	6

Definitions

1. **Organization**

   Include one Constituent as defined in the Constituent List.

2. **Nonprofit Status**
   Does "Organization" have nonprofit status (i.e., no part of income or assets inure to the benefit of any director, officer, or employee except as salary or reasonable compensation for services and travel expenses)? Yes or No.

3. **Contact Person**
   The person to contact for additional information about "Organization."

4. **Contact Person Title**
   The official title of "Contact Person."

5. **Contact Person Telephone**
   The daytime telephone number of "Contact Person."

6. **Administrator**
   The person with immediate responsibility for the administration of "Organization."

7. **Administrator Title**
   The official title of "Administrator."

8. **Administrator Telephone**
   The daytime telephone number of "Administrator."

9. **Agent**
   The person or organization, if other than "Contact Person," who serves as "Organization's" contact for sales, exhibitions, services, information, etc.

   Include one Constituent as defined in the Constituent List.

10. **Agent Telephone**
    The telephone number of "Agent."

11. **County**
    The county or parish in which "Organization's" principal place of business is located.

12. **Region**
    The sub-state region in which "Organization's" principal place of business is located.

(continued)

13. Discipline

The arts discipline in which "Organization" is involved. The following code will be used:
(see pp. 116-117 for definitions)

Note: It is understood that an agency can elect to use main discipline categories only (e.g., Dance, Music, Theatre) and not sub-categories (e.g., mime, musical theatre, puppet). Also note that "Humanities" is listed for use by agencies which serve both the arts and humanities.

- 01 **Dance**
  - A ballet*
  - B ethnic / folk / jazz*
  - C modern*
- 02 **Music**
  - A band* (do not include jazz or popular)
  - B chamber*
  - C choral*
  - D contemporary* (include experimental, electronic)
  - E ethnic / folk*
  - F jazz*
  - G popular* (include rock)
  - H solo / recital*
  - I symphonic*
- 03 **Opera**
- 04 **Theatre**
  - A theatre - general* (include classical, contemporary, experimental)
  - B mime*
  - C musical theatre*
  - D puppet*
  - E theatre for young audiences*
- 05 **Visual Arts**
  - A conceptual art*
  - B graphics*
  - C inter-media*
  - D painting*
  - E performance art*
  - F sculpture*
- 06 **Architecture / Design**
- 07 **Crafts**
- 08 **Photography**
- 09 **Media Arts**
  - A film*
  - B radio*
  - C television*
  - D video* (include holography)
- 10 **Literature**
- 11 **Community Arts**
- 12 **Folk Arts**
- 13 **Humanities**
- 14 **Multi-disciplinary**
- 15 **Non-arts / Non-humanities**

14. Audience Type

The type(s) of audience(s) for which "Organization's" programs are appropriate. The following code will be used:

Note: Unlike other National Standard codes, several of these code categories may apply in any given case. Therefore, all applicable codes should be selected (e.g., a Native American audience of deaf eleventh graders would be coded "NYD"). Any categories needed by an agency but not available here (e.g., French American, rural, preschool, summer resident, etc.) can be added, but it must be understood that these categories would be used *in addition to* and *not instead of* the National Standard (e.g., a French American audience would be coded as such in addition to "W - White, not Hispanic").

- N American Indian / Alaskan Native**
- A Asian / Pacific Islander**
- B Black, not Hispanic**
- H Hispanic**
- W White, not Hispanic**
- G general
- C child
- Y secondary school student
- U college / university student
- S senior citizen
- E emotionally and mentally disabled
- P physically disabled
- D hearing impaired
- Q visually impaired
- I institutionalized
- V veteran
- F woman

*Optional

**See footnote on p. 134.

Sponsors/Presentors

Fields

Label	Type Required	Need	Possible Field Size
1. Sponsor / Presentor	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10

Note: It is understood that to insure a resource directory's maximum effectiveness an agency may *require* information in every occurrence of certain fields (such as "Sponsor / Presentor"). However, because resource directories are themselves optional—that is they contain information which state and regional arts agencies *may* provide according to their needs but are not required to provide—these fields are Optional according to the National Standard.

2. Nonprofit Status	Yes or No	Optional	1
3. Telephone	Numeric	Optional	12
4. Administrator	Text	Optional	20
5. Administrator Title	Text	Optional	20

Note: Further specification allowing an agency to select particular types of sponsors will be available if this resource directory is cross-referenced to the National Standard Mailing List System "Mail Code." If a concurrent mailing list system is not available, an "Organization Type" code would be appropriate here.

6. County	Text	Optional	12
7. Region	Numeric or Text	Optional	3
8. Contact Person	Constituent	Optional	N/A
ONE CONSTITUENT FROM THE CONSTITUENT LIST			
Name (organization or individual)			30
Address 1			20
Address 2			20
City			16
State			2
ZIP Code			10
9. Contact Person Title	Text	Optional	20
10. Largest Fee Paid for One Event	Numeric	Optional	9
11. Current Year Arts Programming Budget	Numeric	Optional	9
12. Previous Year Arts Programming Budget	Numeric	Optional	9
13. Discipline	Numeric	Optional	3
14. Audience Type	Numeric	Optional	6

Note: A list of facilities available to the "Sponsor / Presentor" is a function of the Performing Arts Facilities and Visual Arts Facilities Resource Directories. If such directories are available, it is suggested that they be cross-referenced to the Sponsors / Presentors Directory. If concurrent facility directories are *not* available, a modified listing including the name, type, and capacity of available facilities would be appropriate here.

Definitions

1. **Sponsor / Presentor**
   The name and address of an organization which presents or exhibits arts events for the public (e.g., performance facilities, museums, cinemas, etc.).

   Include one Constituent as defined in the Constituent List.

2. **Nonprofit Status**
   Does "Sponsor / Presentor" have nonprofit status (i.e., no part of income or assets inure to the benefit of any director, officer, or employee except as salary or reasonable compensation for services and travel expenses)? Yes or No.

3. **Telephone**
   The telephone number of "Sponsor / Presentor."

4. **Administrator**
   The person with direct responsibility for the activities of "Sponsor / Presentor."

5. **Administrator Title**
   The official title of "Administrator."

6. **County**
   The county or parish in which "Sponsor / Presentor's" principal place of business is located.

7. **Region**
   The sub-state region in which "Sponsor / Presentor's" principal place of business is located.

8. **Contact Person**
   The person to contact for additional information about "Sponsor / Presentor" if different from "Administrator." Include Constituent List entry if home address is desired; otherwise name only.

   Include one Constituent as defined in the Constituent List.

9. **Contact Person Title**
   The official title of "Contact Person."

10. **Largest Fee Paid for One Event**
    The largest fee (inclusive of all subsidies) which "Sponsor / Presentor" ever paid to an individual or organization for a single arts activity.

11. **Current Year Arts Programming Budget**
    Total cash budget allocated for sponsorship of arts events during current fiscal year.

12. **Previous Year Arts Programming Budget**
    Total cash budget allocated for sponsorship of arts events during previous fiscal year.

13. Discipline

The primary arts discipline presented by "Sponsor / Presentor." The following code will be used: (see pp. 116-117 for definitions)

Note: It is understood that an agency can elect to use main discipline categories only (e.g., Dance, Music, Theatre) and not sub-categories (e.g., mime, musical theatre, puppet). Also note that "Humanities" is listed for use by agencies which serve both the arts and humanities.

01 Dance
- A ballet*
- B ethnic / folk / jazz*
- C modern*

02 Music
- A band* (do not include jazz or popular)
- B chamber*
- C choral*
- D contemporary* (include experimental, electronic)
- E ethnic / folk*
- F jazz*
- G popular* (include rock)
- H solo / recital*
- I symphonic*

03 Opera

04 Theatre
- A theatre - general* (include classical, contemporary, experimental)
- B mime*
- C musical theatre*
- D puppet*
- E theatre for young audiences*

05 Visual Arts
- A conceptual art*
- B graphics*
- C inter-media*
- D painting*
- E performance art*
- F sculpture*

06 Architecture / Design

07 Crafts

08 Photography

09 Media Arts
- A film*
- B radio*
- C television*
- D video* (include holography)

10 Literature

11 Community Arts

12 Folk Arts

13 Humanities

14 Multi-disciplinary

15 Non-arts / Non-humanities

14. Audience Type

The type(s) of audience(s) to which "Sponsor / Presentor" offers its services. The following code will be used:

Note: Unlike other National Standard codes, several of these code categories may apply in any given case. Therefore, all applicable codes should be selected (e.g., a Native American audience of deaf eleventh graders would be coded "NYD"). Any categories needed by an agency but not available here (e.g., French American, rural, preschool, summer resident, etc.) can be added, but it must be understood that these categories would be used *in addition to* and *not instead of* the National Standard (e.g., a French American audience would be coded as such in addition to "W - White, not Hispanic").

- N American Indian / Alaskan Native**
- A Asian / Pacific Islander**
- B Black, not Hispanic**
- H Hispanic**
- W White, not Hispanic**

- G general

- C child
- Y secondary school student

- U college / university student
- S senior citizen

- E emotionally and mentally disabled
- P physically disabled
- D hearing impaired
- Q visually impaired

- I institutionalized
- V veteran
- F woman

*Optional
**See footnote on p. 134.


PROGRAMMING NOTES

Programming Notes

The following notes are intended as a guide for systems analysts, computer programmers, consultants, administrators, and others involved in developing computer systems which are in compliance with the National Standard for Arts Information Exchange. They clarify some common misunderstandings about National Standard system requirements and suggest techniques which arts agencies have used to make their information systems more effective or easier to use. They should be used in conjunction with the detailed explanation of the National Standard found in Chapter III (p. 43) and the Standard system specifications themselves (pp. 105-167).

Note 1

The National Standard does not require or recommend any particular computer equipment or language. There is no preference for an information storage medium such as cards, tapes, disks, or diskettes. It is insignificant whether an agency has online access to its information or uses a batch processing arrangement, and whether it owns its own equipment or contracts for outside services. The only important requirement is that mailing list, grants management, and arts resource directory systems be able to provide all Necessary and any chosen Optional fields, selections, and reports in the manner specified by the National Standard.

Some arts agencies with National Standard computer systems have shared programs or used similar types of equipment. When this has been possible, it has saved system development costs and time. However, the National Standard does not require such collaboration; an agency should choose whatever methods to comply with the Standard that it finds least costly and most effective.

Note 2

The order in which National Standard fields are listed is not a requirement except in Standard report formats. Although the fields are generally listed in a logical order, that order is unimportant to agencies implementing National Standard systems. Each agency should determine its own requirements and arrange the fields it needs in an order which is easily understood and used. It is recommended, however, that all National Standard fields be identified as such (e.g., "Discipline" is National Standard Grants Management System field 38) in the instruction manuals and program documentation developed for computer systems.

Note 3

The "Possible Field Size" listed for each field in the National Standard is not a requirement. Field lengths should be determined by each agency according to its own requirements and those of the computer equipment it uses. In some computer systems there will be no need to determine maximum field lengths. Possible field sizes are included in the National Standard as suggestions for those agencies which are implementing computer systems for the first time and which must limit their field sizes to a predetermined number of characters.

Note 4

The National Standard does not specify sorting requirements. However, it is assumed that all computer systems will have the ability to sort data in some manner, such as by ZIP Code, when producing mailing labels, and alphabetically by the applicant's name, when providing grant reports.

Note 5

The National Standard cannot be changed. Except in some isolated cases discussed in Chapter III, Standard codes are to be included in information systems exactly as shown. An agency may not use "equivalent" codes in place of Standard codes, such as using letters of the alphabet instead of numbers. Nor may it "hide" codes in other fields, such as by embedding the "Discipline" code "02 Music" in a grant application number like this: 1982-0023-02. An agency may choose to include the discipline in its application numbers, but the Grants Management System code for "Discipline" must appear as a unique field as well.

Note 6

Fields for "Last Name" and "First Name" do not meet the National Standard. The Standard field for a name is "Name (organization or individual);" it appears in the Constituent List and therefore in every National Standard system. It is acceptable to *also* include fields for "Last Name" and "First Name" if desired, but such fields may not replace "Name (organization or individual)." Note 11 below suggests a method to provide correct sorting of the field "Name (organization or individual)," thus removing the need for "Last Name" and "First Name" fields.

Note 7

Selection by the National Standard "Discipline" code requires selection of both major and subcategories. When the Standard requires selection by one of the "Discipline" code's major categories (e.g., 01 Dance), the associated sub-categories (e.g., 01A ballet, 01B ethnic / folk / jazz, 01C modern) must also be included in the result. For example, a selection of all entries with "Discipline" code "01" would provide all entries coded "01," including the "A's," "B's," and "C's," as well as entries where only "01" with no sub-category were given. The National Standard also requires that an agency electing to use the Optional sub-categories be able to code and select entries without using sub-categories (e.g., to code and select as "02" those entries which are neither "02A's," "02B's," or "02C's").

Note 8

Selection according to the National Standard "Mail Code" requires both "and" and "or" combinations. An agency must be able to select by four "Mail Code" "TARGET" categories (a STATUS, a FUNCTION, an INSTITUTION, and a DISCIPLINE) and expect to receive only entries with all four specified codes. It should also be able to choose one, two, or three categories (e.g., a single STATUS; one STATUS and an INSTITUTION; one apiece of STATUS, FUNCTION, and DISCIPLINE), and ignore those not specified for selection. Furthermore, it must be possible to choose several "CONTENT" categories in one operation (e.g., all the "05's," "09's," and "17's"). In every instance of "Mail Code" use, an agency must be able to make selections using "and's" and inclusive "or's."

Note 9

All National Standard reports must be available with all National Standard selections. An agency must be able to provide *every* Standard selection in *every* Standard report format. In other words, for example, it is not enough that an agency can get Mailing List System "Adhesive Labels" selected by STATUS, or a "List" report selected by FUNCTION. It must also be able to get the "Adhesive Labels" selected by FUNCTION and a "List" report selected by STATUS.

Note 10

Whenever possible, National Standard fields, selections, and reports should be used exactly as they appear in the Standard. To avoid confusion in the use or future modification of computer programs and procedures, it should be clear on screen layouts, printouts, forms, instruction manuals, specifications, and other documentation exactly which components of the system derive from the National Standard and which are unique to the agency. In written documentation, National Standard terms and definitions should always be used; in programs and user prompts, they should be used wherever possible and applicable.

Note 11

Suggested: use an asterisk (*) to separate last names and first names of individuals in the field "Name (organization or individual)." Rather than provide separate fields for "Last Name" and "First Name," enter individuals' names last-name-first with an asterisk between the last and first names (e.g., "OLMSTED*FREDERICK L"). Then in a list sorted by "Name (organization or individual)," each individual will appear alphabetically by surname (e.g., "OLMSTED*FREDERICK L" will appear in the "O's"). The label-making computer program can then check for the asterisk before printing each label, and switch the last and first names around (e.g., "OLMSTED*FREDERICK L" will print as "FREDERICK L OLMSTED" on a label). Any names without asterisks (e.g., "RIVERSIDE ART GALLERY") will not be affected. This technique not only removes the need for separate "Last Name" and "First Name" fields, but also makes effective use of the storage space reserved for "Name (organization or individual)."

Note 12

Suggested: use a "check-off" "CONTENT" code. The "CONTENT" section of the National Standard Mailing List System "Mail Code" allows each entry to be coded with any or all of the "CONTENT" categories. The Standard specifies nineteen such categories, and most agencies will use several others in addition. The conventional way to display or print the "CONTENT" categories assigned to a particular entry is to list them like this: 03, 07, 08, 17, 18, 19, 22, 24. However, when many codes are assigned to one entry, it is difficult to read such a list and it takes a great deal of storage and printing space. A better method to indicate "CONTENT" categories would be to create a field of characters which can either be "checked-off" or left blank. Each character in the field would represent one "CONTENT" category, that is, the first position would be "01," the second "02," and so forth. This field can be represented by a group of numeric digits, one through zero, repeated several times. A field allowing twenty-three "CONTENT" categories would be shown as "12345678901234567890123." To code a Mailing List System entry for "12," a "check" would be placed in the twelfth position of the series like this: 12345678901.34567890123. By observing that the second "2" in the list has been marked, a user would know that the category "12," rather than "2" or "22," has been checked off. Any or all categories can thus be marked, and when the computer selects entries requiring a particular mail "CONTENT," it will not need to go through a list of codes for each entry, but can simply check to see whether a given position has been marked.

Note 13

Suggested: suppress the least used field on a crowded address label. If an agency elects to use all Necessary *and* Optional Mailing List System fields, the following six lines printed in this format will crowd a standard 3 3/16" x 7/8" address label:

Contact Person
Contact Person Title
Name (organization or individual)
Address 1
Address 2
City State ZIP Code

If one field (e.g., "Contact Person," or "Contact Person Title," or "Address 2") in a given entry is not used (as is frequently the case), and *if the computer does not skip a line on the label to allow for the blank field*, there will be no problem. Labels will look like this:

Contact Person Title
Name (organization or individual)
Address 1
Address 2
City State ZIP Code

or

Contact Person
Name (organization or individual)
Address 1
Address 2
City State ZIP Code

or

Contact Person
Contact Person Title
Name (organization or individual)
Address 1
City State ZIP Code

However, if all eight fields are filled in, it is suggested that the computer suppress the field "Contact Person Title" when it prints labels. Such an arrangement will allow agencies to collect all Mailing List System fields if desired and yet be able to use standard size labels.

Note 14

Recommended: do not use all Optional fields. The National Standard includes both Necessary and Optional fields. The former must be included in every system, either to make it effective or to meet national needs for compatible information. The latter, however, are a collection of scores of fields which have been demonstrated to be *useful* in some agencies. The National Standard does not recommend the use of *all* such fields by *all* agencies; rather it presents them as a standard for those agencies which have a clearly demonstrated need for such information.

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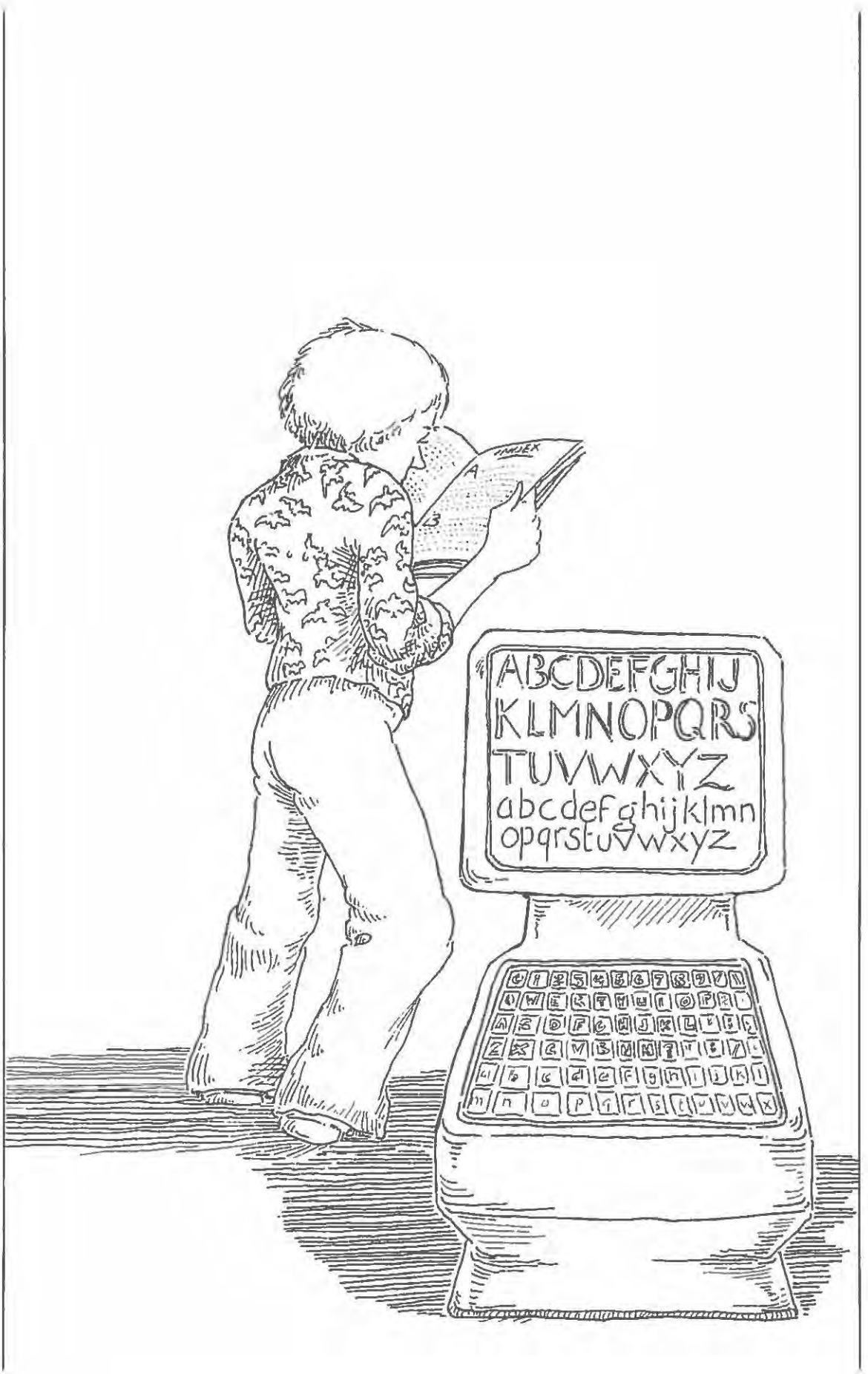
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Index

The Index combines references to both the general text and the text of the National Standard for Arts Information Exchange. Field and code names are entered exactly as they are found in the National Standard, e.g., "Type of Artist." Cross references have been made (when possible) from significant elements in a field or code name to facilitate access, e.g., "Artist *see* Type of Artist." Each field and code name or category has been qualified by the words "code" or "field" in parentheses, e.g., "Type of Artist (field)" or "Crafts (code)." Code categories designated in the National Standard as "None of the above," "General," or "Other" have not been indexed. Fields or code categories such as "Other Revenue" or "Other Residency" have been indexed. Page numbers that refer to the text of the National Standard are set in *italics*.

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