ANNUAL REPORT TO THE UNITED STATES CONGRESS NATIONAL INSTITUTE ON ALCOHOL ABUSE AND ALCOHOLISM

HV 5285 .N156a 1972/73 c. 1 Sci

ANNUAL REPORT

THE UNITED STATES CONGRESS,

FISCAL YEAR 1973

NATIONAL INSTITUTE ON ALCOHOL ABUSE AND ALCOHOLISM (0,5,

ALCOHOL, DRUG ABUSE AND MENTAL HEALTH ADMINISTRATION and a many consultation of the contribution of the second states. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE



THE UNIVERSITY OF CHICAGO LIBRARY

SEP 1979

DOCUMENT EXPEDITER

NATIONAL INSTITUTE ON ALCOHOL ABUSE AND ALCOHOLISM

ANNUAL REPORT

PREFACE

This is a report of action taken, services provided, and funds expended during the second full year of operation of the National Institute on Alcohol Abuse and Alcoholism (NIAAA). The Institute became operational in May 1971, and its activities during the first year of its existence were the subject of its Report to Congress for Fiscal Year 1972.

During Fiscal Year 1973 progress has been made demonstrating effective methods of preventing problem drinking and alcoholism through fostering the concept and practice of responsible alcohol use by educational and informational techniques.

As shown in Table 1 (page 3), \$90,829,000 was obligated by NIAAA for Fiscal Year 1973. These Federal resources supported programs through the activities of the Institute's four operating Divisions functioning in the areas of Community Assistance, Special Treatment and Rehabilitation, Prevention, and Research.

The State Alcoholism Formula Grant Program was activated through an appropriation of \$30 million. All States, the District of Columbia, Puerto Rico, the Trust Territory of the Pacific Islands, Guam, Samoa, and the Virgin Islands participated.

Direct service project grants and contracts were awarded during the fiscal year in the amount of \$39,255,000. In the process, NIAAA surpassed its operational objectives and increased by 40 percent the number of clients in the Comprehensive Treatment Programs.

During the year, the Institute developed a youth education program that was directed primarily at the Nation's young people who represent a major segment of the population, as well as their parents from whom attitudes and lifestyle practices, important to alcohol abuse and alcoholism prevention, are first learned and developed.

In the training area, NIAAA concentrated its efforts on supporting training for personnel directly related to ongoing treatment programs. Within this classification, the Institute perceived three distinct groups of people:

- counselors
- professionals who have acquired positive attitudes and recognize that alcoholic people can be helped
- members of the community who are in a natural posture to provide entry in an alcoholism treatment system, such as clergy, physicians, teachers, attorneys, Government officials, police any group to whom people in trouble turn for help

The Institute's extramural research program received a wide variety of grant applications aimed at problems associated with the use and abuse of alcohol. It funded 102 grants and contracts in the total amount of \$6,472,000. The grants awarded were for basic and applied studies on the behavioral and biomedical aspects of alcohol abuse, the nature and process of treatment and rehabilitation, prevention techniques and the etiology of alcoholism.

In addition, 23 projects were funded in the amount of \$2,183,045, specifically focusing on health care services, new techniques for improving the productivity for our medical system, and innovative projects in alcoholism research.

The treatment of alcohol abuse and alcoholism is now emerging from an area of neglect to an area of understanding.

Morris E. Chafetz, M.D.

Director

National Institute on Alcohol Abuse and Alcoholism

TABLE OF CONTENTS

<u> </u>	age
Preface	i ,
National Advisory Council on Alcohol Abuse and Alcoholism	14
Program Development and Evaluation	6
Program Coordination	14
Division of State and Community Assistance Programs	17
Division of Special Treatment and Rehabilitation Programs	23
Division of Prevention	32
Division of Research	38
Training	48
Public Affairs	52
Health Initiative Program	56
Alcohol and Health Report	59
Health Insurance Coverage for Alcoholism	60
International Activities	62

THE PARTY OF THE PROPERTY OF THE PARTY OF TH

TABLES

		Page
Table l	NIAAA Program Obligation FY 1973	3
Table 2	Average Client Changes, October 1 thru December 31, 1972 (On Intake, and 90, 180 Days After Intake)	11
Table 3	State Formula Grants	19
Table 4	Community Project Grants and Contracts	20
Table 5	Extramural Research Grants	j j
Table 6	Training Grants Program	51

The state of the s

The National Institute on Alcohol Abuse and Alcoholism was established within the National Institute of Mental Health by Public Law 91-616 (December 31, 1970) and became operational in May 1971. Public Law 93-282 (May 14, 1974) made the Institute a part of the Alcohol, Drug Abuse and Mental Health Administration, one of the six agencies reporting directly to the Assistant Secretary for Health.

The President, in reviewing the Institute's Annual Report to Congress for Fiscal Year 1972, wrote to the Secretary of the Department of Health, Education, and Welfare on July 6, 1973:

"...the report makes clear the problems fostered in our society by alcohol abuse are indeed enormous and much remains to be done in dealing effectively with them. However, I am encouraged by the significant beginnings we have made in properly recognizing the seriousness of the situation, in developing a greater understanding of alcoholism as an illness, and by the measures which have been initiated for early identification and treatment."

This Report to Congress for Fiscal Year 1973 outlines considerable progress made from the "significant beginnings" noted by the President and reaffirms the willingness and capability of American communities to confront the many problems related to the irresponsible use of alcohol when Federal leadership and support are available.

During Fiscal Year 1973, in addition to the Institute's responsibility for administering grant programs, other activities were emphasized. Increased stress was placed on the evaluation of service programs funded to date, on the extension of prevention activities, and on the development of research and demonstration projects in a variety of areas to utilize evaluation findings and to stimulate the development of alternative fiscal resources for community treatment programs.

The Institute in Fiscal Year 1973 has brought about changes in attitudes and priorities at State and community levels which allow

for the development of treatment, prevention, and research efforts to cope with this Nation's number one drug problem: alcohol abuse.

TABLE 1

NIAAA PROGRAM OBLIGATION

FY 1973

Manpower Development Community Programs: Project Grants and Contracts State Formula Grants Subtotal Management and Information: Direct Operations Public Information Subtotal Subtotal TOTAL Obligations 4,997,000 4,997,000 539,255,000* 69,255,000 69,255,000 69,255,000 59,656,000 9,656,000	n	•	\$6,921,000
Community Programs: Project Grants and Contracts \$39,255,000* State Formula Grants 30,000,000** Subtotal 69,255,000 Management and Information: Direct Operations 8,158,000*** Public Information 1,498,000 Subtotal 9,656,000	Research		4,997,000
Project Grants and Contracts \$39,255,000* State Formula Grants 30,000,000** Subtotal 69,255,000 Management and Information: Direct Operations 8,158,000*** Public Information 1,498,000 Subtotal 9,656,000	Manpower Development		
State Formula Grants Subtotal Management and Information: Direct Operations Public Information Subtotal Subtotal 30,000,000** 69,255,000 8,158,000*** 1,498,000 9;656,000	Community Programs:		
State Formula Grants 30,000,000** 69,255,000 Subtotal 69,255,000 Management and Information:	Project Grants and Contracts	\$39,255,000*	
Subtotal Management and Information: Direct Operations Public Information Subtotal 9;656,000		30,000,000**	
Direct Operations 8,158,000*** Public Information 1,498,000 Subtotal 9,656,000	Subtotal		69,255,000
Public Information 1,498,000 Subtotal 9;656,000	Management and Information:		
Public Information 9;656,000 Subtotal	Direct Operations	8,158,000***	
9;656,000 Subtotal	Public Information	1,498,000	
TOTAL Obligations \$90,829,000			9,656,000
	TOTAL Obligations		390,829,000

See Table 4 See Table 3 Includes Regional Offices

Mandate

During Fiscal Year 1973, the National Advisory Council on Alcohol Abuse and Alcoholism continued to provide consultation, advice, recommendations and other assistance to the Secretary of Health, Education, and Welfare regarding the policies, programs, priorities and emphasis in the area of alcohol abuse and alcoholism.

The Council also recommended effective policies and procedures for coordination of activities in alcohol abuse and alcoholism-related programs of various agencies within the Department, as well as reviewing and making recommendations on applications for grants related to prevention, research, training, and services in the field of alcohol abuse and alcoholism.

Membership

The Council is composed of fifteen appointed members and two Ex Officio members.

Meetings

The Council met four times in Fiscal Year 1973.

ACCOMPLISHMENTS

The Council's major contributions have been:

- 1. Consistent high level scientific review and evaluation of research, training, prevention, community assistance, occupational, and special project grant requests for Federal support. The Council reviewed 554 applications requesting total funds in the amount of \$255,434,919. Of these, 257 applications were recommended for approval in the amount of \$69,883,651, many of which were for over one year of program effort, 196 applications amounting to \$100,153,078 were recommended for disapproval and 101 applications in the amount of \$85,398,190 were deferred for further development by the applicants.
- Consideration and review of policy and issues related to the functions of the Institute including:
 - A policy statement, guidelines, and resolution on developing and expanding comprehensive alcoholism treatment programs through use of voluntary agencies.

COLUMN TO THE PARTY OF THE PART

The statement, "A Guide to Developing Comprehensive Alcoholism Treatment Programs," emphasizes to recipients of NIAAA community assistance and project grants the importance of cooperation with the voluntary help groups (i.e., Alcoholics Anonymous, Jaycees, Goodwill Industries, Salvation Army, and others), in planning and in the provision of services.

- A proposal for changes in Highway Safety Program Standards relative to alcohol dependency.
- Participation in international alcohol abuse and alcoholism activities.
- Submission of a resolution to the Secretary of Health, Education, and Welfare recommending that the Comprehensive Alcohol Abuse and Alcoholism Prevention, Treatment and Rehabilitation Act be amended to provide for the admission of alcoholic individuals to public and private hospitals.
- Submission of a resolution to the Secretary recommending a change in the organizational placement of the National Institute on Alcohol Abuse and Alcoholism within the Department of Health, Education, and Welfare in order to maximize its potential.
- -- Approval of an effective monitoring and evaluation system for major activities within the Institute.

3. The provision of major input toward:

- The establishment of Operational Planning System Objectives.
- The extension of health insurance coverage to alcoholic people.
- The regional coordination of activities in alcohol abuse and alcoholism.

PROGRAM DEVELOPMENT AND EVALUATION

Development and Planning

An Operational Planning System (OPS) has been developed within the National Institute on Alcohol Abuse and Alcoholism as a procedure for management by objectives and resource allocations. Toward the end of each fiscal year, the Institute develops a number of specific objectives which it incorporates into its operational planning system for the forthcoming fiscal year. These operational objectives are the immediate steps that must be taken by the Institute to accomplish its long-range goals. Progress toward accomplishing these objectives is tracked on a monthly basis by the Institute Director. Problems that arise are discussed at Institute Management Board Meetings.

Following is a brief summary of the seven major objectives developed for FY 1973, including a notation of achievement for each:

Objective No. 1

To identify the number of active clients in treatment as of October 31, 1972, in 41 Community Alcoholism Treatment Centers and to increase this number by 40% by June 30, 1973.

Achievement .

The actual increase achieved was 41.2%.

Objective No. 2

To establish 250 occupational alcoholism programs in order to identify a population at risk of an estimated 62,500 employed alcoholic persons, 10% of whom, it may be anticipated, can be brought to treatment within FY 1973.

Achievement

A survey of the Occupational Programs established since July 1, 1972 was conducted. The results received from 38 States indicate the following:

New programs in private enterprise	230
New programs covering State Government amployees	. 20
New programs in city/county govern- ments	12
	262

Employees covered:

Private enterprise State Governments City/county Governments	1,519,863 614,800 607,095
	2.741.758

Objective No. 3

To develop a system for monitoring and evaluating the performance of Alcoholism Treatment Centers in DOT/ASAP* sites and to increase coordination at the community level between the ASAP program and NIAAA Alcohol Treatment Programs, as well as to expand the capacity and effectiveness of these programs to treat and rehabilitate drinking drivers.

Achievement

A pilot evaluation system was implemented in 10 of the 16 sites where NIAAA supported treatment programs that have a priority to serve problem drinking drivers in ASAP sites. The 10 sites began reporting in May. The ASAP's were scheduled to begin reporting August 1, 1973. Ongoing contacts with DOT have been established and maintained at the Federal level to fully effect this objective in the communities where these joint programs/projects are located.

Objective No. 4

To develop a system for monitoring and evaluating the performance of the Indian alcohol treatment programs, to increase the capacity and effectiveness of these 97 programs in order to treat and rehabilitate Indian people, and to determine which treatment modalities work most effectively with this target population.

^{*} Alcohol Safety Action Project (ASAP) funded by the Department of Transportation (DOT).

Achievement

The Data Reporting has three main objectives:

- 1. To provide information to NIAAA about Indian alcoholism programs.
- 2. To provide feedback to individual programs about their activities.
- 3. To develop a comprehensive data base on activities and performance of the programs for research purposes.

Two training sessions for the six pilot programs were held, in addition to individual site visits by the contractor and NIAAA staff.

Data forms designed and used were amended several times as problems were encountered in obtaining information. The development of a methodology for monitoring and/or evaluation of Indian efforts is a task which demands flexibility and many new beginnings. A useful tool as a product of this objective should be ready for use on a limited basis early in 1974.

Objective No. 5

To establish three pilot programs to provide treatment and rehabilitation services for approximately 3,000 public inebriates in order to gain knowledge to influence future program policy and direction.

Achievement

Five pilot programs providing treatment and rehabilitation services for over 4,000 public inebriates each month were established. Data collection processing and analysis are continuing. Site visits were made and technical assistance provided to all five projects. Preliminary indications are that the evaluation data will contribute to effective planning of comprehensive services for public alcoholic people.

Objective No. 6

To increase the capacity and effectiveness of 185 community alcoholism poverty progrems in FY 1973 by 25% — from providing assistance to approximately 10,000 persons and their families in FY 1972 to some 12,500 individuals and their families in FY 1973.

Achievement

The capacity of 185 poverty programs serving 10,000 persons and their families in FY 1972 was increased to serve 12,500 persons and their families in FY 1973 utilizing the same level of resources.

Objective No. 7

To establish within the NIAAA, a Division of Prevention with emphasis on youth education.

Achievement

Since the creation of the Division of Prevention in October 1972, a total of eight grants and six contracts have been awarded in the amount of \$3,647,136. Of this, a total of \$1,010,661 was expanded for youth education. Technical assistance was provided by the Division of Prevention staff to all submitted grant applications.

Evaluation

An established policy of the Institute is to include an evaluation component in all sponsored alcoholism programs and projects. Monitoring and evaluation activities cover research, prevention, direct services and training.

The primary purpose of evaluation is to determine effectiveness and efficiency in the use of public funds in support of alcoholism programs and to provide guidance in selection of appropriate alternatives. Results of evaluation are widely disseminated to all concerned in the field of alcoholism.

DATA COLLECTION AND MONITORING SYSTEM

A data collection and monitoring system was developed for continued monitoring of the 44 community oriented Alcoholism Treatment Centers (ATC's) funded by the Institute.

Beginning in August 1972, the system was incrementally implemented and subsequently provided monthly output reports on client characteristics, treatments and other services received, client outcome as a result of treatment, and information regarding management and resource use in these projects.

Key features of the system include data collection on each individual and periodic follow-up on changes in condition. Those changes can then be related to the treatment received. An example of one set of outcome measures is contained in Table 2 (Page 11). That table shows, over two separate time intervals, a gradation of improvement in the client groups. It may be noted that the client consumption at intake is approximately ten times as great as that of the total U.S. population, not including abstainers.

Regarding program revenues, the monitoring system indicates that patient fees represent only about 5% of program costs and that third-party payments total less than 7%. The balance of the revenues were received from Federal, State and local governments. It has become apparent that new means of financing these programs through third-party funding must be developed and actions toward that goal are being implemented (See Health Insurance for Alcoholism, Page 60).

The monitoring system is only one means of providing indicators of performance of service programs. Those indicators are augmented by information gained through direct observation and on-site visits. During site visits, public forums are conducted within the community being served in order to gain perceptions of alcoholism service as viewed by the actual users.

This monitoring service is being adapted for use, and is being operationally tested, in special population alcoholism programs, e.g. American Indian Projects, Industrial Employee Programs, and Public Inebriate Projects.

TABLE 2 AVERAGE CLIENT CHANGES OVER

TIME PERIOD COVERED OCTOBER 1 THRU DECEMBER 31, 1972

(On Intake, 90, and 180 Days After Intake)

		90 Days	\$		-	180 Days	£ri€	
	Intake N	Intake N Intake	Change	*	Intake	Intake	Change	×
ABSOLUTE ALCOHOL CONSUMED/DAY (028.)**	7.9 .7 1.3	1.3	×118-	1385	1.8	2.2	-725	111
SELF-PERCEPTION (0-11)	0.8	11.8	-40% 1394	1394	8.3	5.1	-39%	425
INPAIRMENT (p-28)	12.2 68	3.2	111 L	1400	12.8	4.4	299 -	l;23
DAYS WORKED LAST MONTH	TO.7	11.9	+11% 1340	1340	11.21	13.8	,23%	373
AV. DAYS DRAIK LAST MONTH	14.8 gr 3.9	3.9	% h L-	1005 14.6	14.6	1, .8	¥19-	370
INCOME EARNED LAST MONTH	\$241.00 \$254.00	1254.00	+11%	1347	1347 \$235.00	\$295.00	+25%	399
% UNEMPLOYED LAST MONTH	→ 5.44	28.9	-35%	1092	39.2	23.9	-39%	314

Numbers reflect all 90 and 180 day client progress and follow-up data in computer files.

* * ,一个一个人,这个人的,我们就是一个人的时候,我们就是一个人的时候,我们就是一个人的时候,我们就是一个人的时候,我们就是一个人的时候,我们就是一个人的时候,我们 1990年,一个人的时候,我们就是一个人的时候,我们就是一个人的时候,我们就是一个人的时候,我们就是一个人的时候,我们就是一个人的时候,我们就是一个人的时候,我们

Average National per capita consumption for the U. S. drinking population is 0.78 ozs. per day.

^{*** 1789} at intake.

PUBLIC SERVICE EDUCATION CAMPAIGN EVALUATION

The campaign mounted by the Institute to educate the public regarding responsible use of alcohol is being evaluated. The objective is to determine public awareness of individual messages and themes and to identify attitude and aspiration changes due to the media campaign.

The basic point established was that NIAAA public service announcements received very satisfactory usage on television and radio, and public recognition of specific messages was gratifyingly high.

The most frequently run messages were seen or heard by about one-fourth of the adult U. S. public, a record that compares well with major commercial campaigns. Awareness continued to rise significantly in the time between the first and second evaluation studies, conducted in September 1972 and March 1973.

INTER-AGENCY COOPERATIVE EFFORT EVALUATION

The Institute continues to emphasize mutual assistance among departments and agencies involved in evaluation of alcoholism programs. Particularly significant actions have been taken with the Department of Transportation, the Veterans Administration, and with individual States.

- A pilot data collection and monitoring system is being implemented in 10 sites to provide evaluative information on joint alcoholism projects directed toward drinking drivers. These projects will provide information on each drinking driver and track subsequent treatment and rehabilitation success. The system will allow comparison of treatment modality successes among clients as well as among projects and will provide significant effectiveness, cost benefit, and other information needed to improve the program.
- Through the involvement of the Department of Transportation and NIAAA it is expected that a more comprehensive determination of treatment success will be achieved.
- The Veterans Administration has expressed considerable interest in NIAAA's evaluation system and many of its facilities are implementing it in their Alcoholism Treatment Programs. Close liaison will be continued with the Veterans Administration and with the individual VA treatment facilities for mutual support and exchange of information regarding alcoholism and its treatment.
- The Institute also is working closely with a number of the States to ensure that the Institute's requirements satisfy the needs of the individual States.

Several States requested authorization to incorporate the data system used by the Institute and encouragement and assistance were offered in each case. Additionally, monthly output records are provided in each State pertaining to Alcoholism Treatment Centers within its boundaries.

STATE ALCOHOLISM SERVICE EFFECTIVENESS

An evaluation of community support of alcoholic persons released from State hospitals is in progress in the State of Texas. That project is to determine the success of community-based services through a survey of 900 persons at the time of their discharge from State hospitals and again 18 months later. The sample group will be studied for all factors effecting patient change. The sample group will also be matched against a group of 900 clients discharged from State hospitals at an earlier time and provided with fewer or no support services.

ECONOMIC COST OF ALCOHOLISM

The cost of alcohol abuse and alcoholism to society is estimated to be \$25 billion a year. This project now in progress is designed to determine the economic cost of alcoholism and will yield precise information on both direct and indirect costs.

The economic efforts for a one-year period will be studied with costs defined in terms of loss of production (indirect costs) and in terms of direct costs. Those costs incurred by Federal, State and local governments and the private sector of the economy will be separately identified.

The study should provide important inputs for planning to combat alcoholism and alcohol abuse.

PROGRAM COORDINATION

During Fiscal Year 1973, the Institute formulated the objectives and goals of Program Coordination and established a framework for its program. The objectives were:

- -- To effect optimum liaison, coordination, and evaluation of all Federal alcohol problem-related programs as a total integrated system.
- To serve as the focal point of all inter-agency agreements.
- To provide timely management information for decision-making to the Director and all Divisions, Branches, key staff and Regional Offices.
- To improve the efficiency, effectiveness and utilization of all HEW-NIAAA resources.

COLLABORATION AND INTERACTION WITH OTHER AGENCIES

Improved interaction among Federal programs was achieved as the Institute developed the capability of serving as a focal coordinating point through inter-agency agreements. Efforts were made to gain the cooperation and involvement of a number of other Federal agencies whose joint resources meet the needs of alcoholic people. These agreements provided for the collaborative utilization of each agency's resources as appropriate.

Inter-agency activities include:

- Department of Defense Alcohol Programs Activity

Program activity was coordinated with the Department of the Army and the Department of the Navy under which NIAAA provides consulting support in the creation and evaluation of their programs. (Technical support provided by NIAAA is described in the Special Treatment and Rehabilitation Programs section of this Report.)

- Department of Transportation Alcohol Safety Action Programs

Coordinated effort between NIAAA and the National Highway
Traffic Safety Administration (NHTSA) of the Department of
Transportation served to accelerate the provision of services
to the alcohol countermeasures program of that Department.
A part of the support provided was technical source information
and resource capability on the causes and consequences of abusive
drinking. NHTSA reimbursed NIAAA in the amount of \$100,000.

-- Department of Transportation Public Education Campaign

A cooperative survey effort was entered into by the National Highway Traffic Safety Administration (DOT) and NIAAA to determine, analyze, and evaluate the impact of the ongoing public education campaign concerning alcohol use and highway safety. NIAAA was reimbursed \$50,000 of a total of \$275,000 expended by NIAAA for a comprehensive survey/evaluation effort.

- Department of Labor Rehabilitation Research

An agreement was coordinated between the Manpower Administration of the Department of Labor and NIAAA for the rehabilitation of problem drinkers in the Baltimore area with the purpose of retaining them on the job. This agreement sought to integrate and coordinate the planning and funding of an alcoholism program of interest to both agencies. The goal was for both agencies to identify, explore and innovate techniques for bringing a higher quality of treatment services to a greater number of employed alcoholic people, as well as to research the development and results of such a program. The project was centered in an industrial employee assistance clinic in Baltimore. In FY 1973, a grant was awarded by the Labor Department to Johns Hopkins University amounting to approximately \$252,000. Eighty percent. of this amount, \$201,363, was reimbursed to the Department of Labor by NIAAA. Funding for FY 1974 will be established on a 50/50 basis.

- Department of Justice Information Program

A collaborative agreement was negotiated by NIAAA with the Law Enforcement Assistance Administration (LEAA), of the Department of Justice, whereby 25,000 police chiefs and other law enforcement decision-makers received essential information on Alcohol and Health. NIAAA reimbursed the Justice Department in the amount of \$750 for these services.

- Center for Disease Control Cooperative Education Program

An agreement was coordinated and negotiated between the Center for Disease Control, National Clearinghouse for Smoking and Health, and NIAAA to provide for inclusion of education on responsible use of alcohol within the program on smoking and health. The inclusion of an alcohol abuse and alcoholism component in the established program on prevention and control of cigarette smoking was of great help to NIAAA. In this way, alcohol education reached health professionals, students, voluntary groups, adults

in various organizations, the military, special minority consumers and leadership in the mass media. The two programs reinforced each other in seeking to help people make better personal choices as to take-up, cessation, modification or control of smoking or alcoholic beverage use.

NIAAA provided \$105,000 as reimbursement for its services to CDC which supported the effort with an additional \$150,000. The joint effort amounted to \$255,000.

DIVISION OF STATE AND COMMUNITY ASSISTANCE PROGRAMS

The Division of State and Community Assistance Programs provides technical and financial support to community organizations seeking facilities to provide alcoholism treatment and rehabilitation services.

State Assistance Branch

State Alcoholism Formula funds were awarded at the end of Fiscal Year 1972 and became available to the 50 States, the District of Columbia and Puerto Rico, for utilization for two years, and to the Virgin Islands, Guam, American Samoa, and the Trust Territories of the Pacific Islands, for three years.

The projected programs became operational during Fiscal Year 1973. However, in implementing the projected plans, many States found it necessary to modify initially considered activities. Acquisition of suitable facilities and recruitment of sufficient staff took longer than anticipated. Appointments and orientation of new State Advisory Council members required immediate attention, as did the formation of local committees and councils in States establishing this type of structure.

The Administrator of the Health Services and Mental Health Administration on July 27, 1972 issued plans for decentralization of the State Alcoholism Formula Grant Program during Fiscal Year 1973. The memorandum indicated that upon receipt of the Delegation of Authority by Regional Health Directors, the authority should be redelegated to the Associate Regional Health Directors for Mental Health until such time as the position of Assistant Regional Health Director for Alcohol Abuse and Alcoholism was established. The formal delegation was issued December 6, 1972. In the interim, draft guidelines were reissued to reflect a decentralized program and Institute staff visits were made to the Regional Offices to discuss future requirements and areas for improvement in individual State plans.

These regional meetings involved State personnel administering plans as well as regional staff and alcohol consultants. Mutual problems were discussed and the State personnel were better oriented to National and Regional objectives. Review, approval, and awarding functions were transferred to Regional Offices. A complete planning document was required.

Major emphasis was placed on assisting States in the development and implementation of strong baseline plans because State plans, developed during the initial years of a program, usually serve as the basis for future planning.

As updated plans arrived in Regional Offices, Central Office staff was called upon to participate as review team members or to submit comments and recommendations to regions not using the more formalized review approach.

Thirty million dollars were obligated to the States by the Regional Offices during Fiscal Year 1973 (Table 3, page 19). In some cases, addendum material to improve the quality of the plan had to be submitted by the State before expenditure of the funds was authorized.

Many States see Fiscal Year 1974 as the time for major revision in the plans. By then, the previously projected programs will have become fully operational and to the point of evaluation; studies initiated will have been completed and results analyzed; and staff capability will be developed throughout the States and communities. (A table showing community project grants and contracts for FY 1973 follows on page 20.)

TABLE 3

STATE FORMULA GRANTS

FY 1973

	Amount	; ·		HINOCELLO .
• .	AMO MILO			206,323
	\$ 575,417	Nebraska	. \$	200,000
عا	200,000	Nevada		
	261,205	New Hampshire		200,000
ne .	322,730	New Jersey		882,985
ses .	2,490,900	New Mexico		200,000
ornia	309,470	New York	•	2,173,848
sdo	360,576	North Carolina	. •	787,390
tticut	200,000	North Dakota		200,000
ire		Ohio		1,421,493
et of Columbia	200,000	Oklahoma		390,870
da.	982,357	Oregon		296,212
ia	689,921	Pennsylvania		1,582,361
· ·	200,000	Rhode Island	•	200,000
	200,000	South Carolina		429,653
ois	1,363,745	South Dakota		200,000
na	713,571	Tennessee	. <u>.</u> .	627,459
	393,709			1,637,272
· ·	300,953	Texas	•	200,000
cky	515,794	Utah		200,000
Lana	582,969	Vermont		661,529
***************************************	200,000	Virginia		453,332
and	504,437	Washington		280,142
chusetts	720,215	West Virginia		620,844
	1,145,128	Wisconsin		200,000
San	525,249	Wyoming		15,133
sota	397,485	Guam	•	486,437
ssippi	657,753	Puerto Rico		10,420
puri	200,000	Virgin Islands		4,741
ns .		American Samoa		
or seasonable in the seasonabl	-	Trust Territory	Pacific	17,972
,		መ ርጥ	AT	\$30,000,000
E		TITI'	M.I.)	~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~ ~

TABLE 4

COMMUNITY PROGRAMS

COMMUNITY PROJECT GRANTS AND CONTRACTS FY 1973

	TA	BLE 4	•	
				\$ 100 miles
	COMMUNITY	Y PROGRAMS .		
•	COMMUNITY PROJECT (CRAIMS AND SOME	•	Section 3
	FY	1973	TS	20 A
· .		**		avin.
0+ 44	•	No. Grants		
Staffing grants		31		Amount
Community demonstration gr	rants			\$7,746,cc
Prevention grants		5	•	1,034,6
Occupational grants		8	•	1,018,56
		•		(
State occupational gran Industrial grants	ts 51 10	\$2	,591,511	
Indian grants	<u> 10</u>	61 1	283,446	3,874,95
Alaskan Natives				<u>। विक्री</u>
OEO Transferred	1414 512		472,826	
American Indian grants Integrated grant award	54 42	3,	344.210	(20) (20) (20) (20) (20) (20) (20) (20)
Public Inebriate grants	. 1	141	991,808 162,500	6,971,34
		5		
Drinking Driver grants		16	·.	2,615,615
Special Project Demonstration	on			1,999,595
•		5	•	
Poverty grants			*	515,576
OEO transfers Non-OEO	158			
	<u> 2</u>	160 9,3 _1	64,562 65,338	9 520 00 0
eelth Initiative grants	•	23		9,529,900
rogram Evaluation		• · · · · · · · · · · · · · · · · · · ·		2,183,045
ontracts				699,000
				1,066,000
	: •	TOTAL	\$	39,254,651
	•			The same of the sa

Community Assistance Branch

Community assistance activities were directed primarily to the immediate goal of providing comprehensive alcoholism treatment and rehabilitation services at the community level. Funds were made available to support initial salary costs of professional and technical personnel providing alcoholism services, the initiation and development of new services programs, and for other specialized demonstration programs and activities.

COMPREHENSIVE TREATMENT PROGRAMS

NIAAA has funded a total of 46 comprehensive staffing programs. During FY 1973, 31 comprehensive staffing programs were awarded continuation grants for a total of \$7,746,000. Thirteen of the remaining 15 programs were also active as of June 30, 1972, with renewal dates of September 1, 1973, or later and will receive continuation funding during FY 1974. The other two comprehensive programs were not operational as of June 30, 1973 because of internal grantee problems.

It is anticipated that in FY 1974 the comprehensive staffing programs will provide the capability for treatment and rehabilitation services in areas where nearly 400,000 alcoholic people live. Each of the comprehensive programs provides a required range of services, including impatient, outpatient, intermediate, and emergency care, as well as consultation and education services. The programs are in communities serving a variety of populations and include alternative approaches to the treatment and care of alcoholic people.

Of the 46 centers supported by NIAAA in FY 1973, 26 were components of Community Mental Health Centers and 14 were closely affiliated with Community Mental Health Centers. The remaining six alcoholism centers were free-standing. Twenty-three of the comprehensive programs served designated poverty areas and, therefore, received preferential poverty funding.

OTHER COMMUNITY SERVICE GRANTS

Support was provided for the continuation of five direct service grants, totaling \$1,034,656. (A direct service grant is for the purpose of demonstrating various programs or methods that can be used by a community to initiate, extend or provide for its delivery system.)

TECHNICAL ASSISTANCE ACTIVITIES

An important function of the Community Assistance-Branch in FY 1973 was the provision of technical assistance in a variety of program skills and activities involved in meeting alcohol-related problems. Such assistance was rendered to requesting public and private agencies, communities and to program sites funded in whole or in part by the Institute.

The nature of the assistance was primarily in the form of consultation, either direct or through contract, covering a broad range of subject matter as diverse as the architecture of the treatment environment, the dynamics of community organization, and fiscal accounting procedures required for health insurance and other third-party payment systems.

MONITORING AND EVALUATION ACTIVITIES

Essential to the proper use of public funds by the Institute for the development of alcoholism programs has been a necessity to implement strong evaluation and monitoring functions in Community Assistance Programs to insure that funds are efficiently expended. A feedback mechanism was created to enable NIAAA management to measure progress toward national objectives and to provide data for local program evaluation. Deficiencies noted in the evaluation procedure are brought to the attention of the individual programs along with recommendations for their correction.

As part of the monitoring effort, extensive on-site evaluations were made to a substantial number of comprehensive programs. Cost analysis studies were made at selected centers funded by the Institute.

Activities within the comprehensive programs led to new and expanded approaches to alcoholism services, including the development of volunteer programs, the establishment of a foster home system as part of transitional care, the creation of a nonprofit corporation to provide employment in an economically depressed area, the development of occupational alcoholism service units and outreach efforts to high-risk special population groups.

Assistance was given to communities for development of more coordinated and integrated approaches to the delivery of prevention and treatment services.

DIVISION OF SPECIAL TREATMENT AND REHABILITATION PROGRAMS

The Division of Special Treatment and Rehabilitation Programs was engaged in developing and supporting programs to reduce and prevent alcohol-related problems in special population groups. Among the collaborative programs established were those providing treatment services designed for alcoholic employees of government and industry, low-income persons, American Indians, Alaskan natives, Blacks, Spanish-Americans, the criminal justice population, women, youth, migrant farm laborers, chronic drunkenness offenders and drinking drivers. The Division is comprised of an Occupational Alcoholism Branch and a Special Projects Branch.

Occupational Alcoholism Branch

In mid July 1972, the Occupational Alcoholism Branch concluded an initial training session for more than 100 Occupational Consultants. The program was based on the "troubled employee" approach of identifying for treatment employed persons suffering from alcohol abuse and alcoholism.

In "troubled employee" programs, supervisors are trained to identify those employees who show impaired job performance. When such impairment persists, the supervisor directs the employee to an Employee Assistance Service where a trained interviewer ascertains the cause(s) of impaired performance and directs the employee to the appropriate community-based agency or agencies for help or treatment. About half of the "troubled employees" will be found to have alcohol-related problems. The rationale for this method of identification is that it leads to early identification of persons suffering from alcohol abuse and it also makes possible the early identification for treatment.

Occupational Consultants are employed by 49 States, the Virgin Islands and the District of Columbia under grants provided by NIAAA for up to three years.

The program constitutes a major step by Government — Federal and State — in dealing with alcoholism in the work force of the Nation.

Forty-nine States, the District of Columbia and the Virgin Islands, initially funded in FY 1972, were continued in FY 1973 with \$2,591,511 in funds. Ten industrial programs, initially funded in FY 1972, were refunded in FY 1973 for a total of \$1,283,446. The programs were designed to develop evaluative data on a variety of aspects of occupational alcoholism.

The major effort of the staff of the Branch and the Occupational Consultants of the States and District of Columbia was directed to:

- -- Informing management and labor of the benefits -- human and monetary -- of these programs to employees and employers.
- Providing consultative support to management and labor in creating such programs for early identification and treatment of employees suffering from alcoholism. While the task is far from complete, an encouraging start was made.

PROGRAMS FOR FEDERAL EMPLOYEES

Civilian Agencies — While the Civil Service Commission (under Public Law 91-616) is responsible for developing programs in civilian Federal agencies in cooperation with those agencies, NIAAA provides, on request, technical consultative assistance to the Commission and to individual Federal agencies. Consultation has covered the design and structuring of programs, and their progress in meeting requirements of the particular work force, and the development and design of training materials for staff employed in the various programs.

Armed Forces — In compliance with Public Law 92-129, Title V, Section 501, the Secretary of Defense commenced the establishment of programs for the identification and treatment of members of the Armed Forces and civilian employees of the Department of Defense. (On request, the NIAAA provides consultative support to Armed Services in the creation and evaluation of their programs. Service programs vary in many particulars in order to meet the circumstances in which uniformed and civilian employees work and live. Requests from the Department of the Army and Navy were so extensive that arrangements are being made to provide reimbursement for services to be performed during FY 1974.)

During FY 1973, site visits for consultation were provided to 72 Federal civilian and military installations in 29 States, Europe and the Far East.

OCCUPATIONAL ACTIVITIES IN THE STATES

Under grants, 49 of the States, the District of Columbia and the Virgin Islands were provided with two trained Occupational Consultants each. They are qualified to create programs or Management Control Systems for business, industry, and State and local government, in cooperation with management and employee organizations.

With nearly 90 million persons employed by thousands of employers, the magnitude of the task is enormous and particularly difficult because there has been a traditional indifference to the problem of alcoholism among employed people. The changes thich occurred during FY 1973 in the attitude of management and labor leadership has been encouraging in both private enterprise and Government. There is reason to believe that this trend will increase as knowledge of the success of modern, well-conceived occupational programs becomes more widespread.

Statistical data on programs created during FY 1973 were not complete at the time this report was completed. However, in 38 States on which information was available:

- -- 262 new programs were implemented.
- A work force of 2,741,738 was covered by the programs.

In the public sector, these State governments implemented programs covering their employees.

Connecticut
Delaware
Georgia
Illinois
Maryland
Minnesota
New Jersey

New Mexico New York Tennessee Texas Utah Washington

Several other States and the District of Columbia were very near to implementing programs at the close of the Fiscal Year.

PROFESSIONAL DEVELOPMENT

The great and continuing expansion in the number of occupational alcoholism programs is expected to create a new field of employment for trained and experienced professional personnel. The Occupational Alcoholism Branch has been encouraged by the growth of the new professional organization, "Association of Labor-Mangement Administrators and Consultants on Alcoholism" (ALMACA).

The NIAAA has also continued to work closely with private, nonprofit institutions and organizations concerned with alcoholism among working people, such as the Alcohol and Drug Problems Association of North America and the National Council on Alcoholism.

Special Projects Branch

POVERTY PROGRAM

The Community Alcoholism Services Poverty Program is a component of the Special Projects Branch within the Division of Special Treatment and Rehabilitation Programs. The program was initiated officially on May 7, 1972, concurrent with the transfer of 185 Alcoholism Recovery Projects from the Office of Economic Opportunity to the National Institute on Alcohol Abuse and Alcoholism.

The intent of the program is to support special projects that demonstrate how a variety of services can be made available, and be effectively utilized, by the poor alcoholic person and his family. In a broader context, it is intended to demonstrate that the low-income person can be integrated into existing health and social service systems.

Additionally, a contract between the National Council on Alcoholism (NCA) and the Office of Economic Opportunity to provide technical assistance and monitoring to the service programs was transferred on July 1, 1972, at a cost of \$305,629.

During FY 1973, 158 of the transferred projects were funded at a level of \$9,364,562. In addition, two projects, initially reviewed and funded by NIAAA during FY 1972, were continued and refunded in FY 1973 in the amount of \$165,338.

The NCA/NIAAA contract to provide technical assistance to poverty programs has been renegotiated for an additional year. The technical assistance capacity under this contract has been substantially reduced in order to add a new task which will address itself to the development of local voluntary agencies in five selected States. The total cost for FY 1973 was \$325,000.

THE AMERICAN INDIAN/ALASKA NATIVE PROGRAMS

The primary goal of the American Indian/Alaska Native Programs is to develop effective alcoholism treatment and rehabilitation services for the American Indian/Alaska Native at the community level, i.e., reservations, rural areas and large cities. The Program is a special initiative of the Institute, rather than a legislative mandate, in recognition of the pandemic nature of the problem.

Programs are supported for education and training of Indian/Alaska Native people and for innovative community services. A major emphasis is on the importance of giving Indian and Alaskan Native people the authority and resources to identify and solve their problems of alcohol abuse and alcoholism themselves.

To meet the needs of the Indian/Alaskan Native Program, special guidelines and program criteria were developed. Grant applications are reviewed by an all Indian Initial Review Committee, which includes both reservation and urban Indian/Alaskan Native people. These members are experienced in the field of alcoholism and represent a broad range of Indian opinion and tribal interests.

Technical assistance to the Institute's 96 American Indian programs is provided by the American Indian Commission on Alcohol and Drug Abuse (AICADA). AICADA is an Indian-staffed and controlled nonprofit organization which is recognized by the diverse Indian community as representative of their interests. Technical assistance to the Institute's 44 Alaskan Native "mini-grants" is provided by the Alaska Native Commission on Alcohol and Drug Abuse. ANCADA is an Alaskan Native-staffed-and-controlled nonprofit organization which is recognized by the Alaskan Native people.

In FY 1973, the Institute funded 140 Indian/Alaskan Native alcoholism programs for \$6,808,844. Ninety-six of the programs received continuation grants; 44 were new starts, a special initiative for Alaska. The Alaskan Native "mini-grant" programs are composed of one-year grants of \$5,000 to \$10,000 to provide for the establishment of village prevention and treatment programs.

In addition to the above-mentioned 140 elcoholism programs, one Indian grant program was supported for \$162,500 by means of an integrated grant award. Two programs, initially funded by NIAAA in FY 1972, will not begin refunding until FY 1974 because of late starts. Two additional grant projects transferred from OEO will not require refunding by NIAAA due to the renewal date of the projects.

In the early part of the year, the Institute sponsored the first National American Indian/Alaskan Native Alcohol Abuse and Alcoholism Seminar to receive direct input to assist the Institute in developing national policy and the future course of American Indian/Alaskan Native Alcohol services. A major outgrowth of the Seminar is expected to be the development of a nationally recognized all Indian/Alaskan Advisory Board to advise the Institute.

In order to be fully responsive to needs associated with American Indian/Alaskan Native alcohol problems, NIAAA also has been working with the Indian Health Services and other Federal agencies that are directly serving the American Indian/Alaskan Native population.

SPECIAL DEMONSTRATION PROJECTS PROGRAM

BLACKS, SPANISH-AMERICANS, THE CRIMINAL JUSTICE POPULATION, WOMEN, YOUTH, AND MIGRANT FARM LABORERS

The Special Demonstration Projects Program is concerned with those target populations for whom categorical programs with official guidelines have not yet been fully developed within the Division of Special Treatment and Rehabilitation Programs. These groups are principally Blacks, Spanish-Americans, the criminal justice population, women, youth, and migrant farm laborers. The Program Director has also given attention to the areas of emergency care (detoxification) services and halfway houses.

While applications for these populations were never actively solicited, a total of 11 were received in FY 1972, seven of which were funded at an annual total of \$682,144. Five of the programs were refunded in FY 1973 at a cost of \$516,000.

The Division of Special Treatment and Rehabilitation Programs has received first drafts of guidelines for programs targeted for Blacks, Spanish-Americans, women, and criminal justice population. Further study and consultation with and about these populations will take place.

A Seminar of Alcoholism Detection, Treatment and Rehabilitation within the Criminal Justice System, jointly sponsored by the NIAAA, Bureau of Prisons, and the Law Enforcement Assistance Administration was planned for October 18 - 19, 1973.

A contract for \$23,825 with the Association of Halfway House Alcoholism Programs of North America, Inc., will result at the end of the 1973 calendar year in the practitioners' reports and recommendations in this rapidly developing area of public-private interaction.

The Coalition of Spanish-Speaking Mental Health Organizations asked for a \$50,000 contract for a conference on alcoholism and its treatment in the Spanish-American communities.

THE PUBLIC IMEBRIATE PROGRAM

The National Institute on Alcohol Abuse and Alcoholism funded five public inebriate projects in Fiscal Year 1972. In Fiscal Year 1973, the total direct cost for the five grants was \$2.6 million. Four of the projects did not begin operation until Fiscal Year 1973.

The general objective of the Public Inebriate Program is the alleviation of drunkenness problems, particularly among those persons living in the subculture of skid row. It is intended that this will be accomplished through the development of comprehensive services which are administratively integrated. The program will focus upon the common needs of the public inebriate: food, clothing, shelter, medical care, alcoholism treatment services, public welfare services and vocational assistance. Each program should develop a full range of services in accordance with the individuals' acculturation into that subculture.

It is expected that the Public Inebriate Program will demonstrate the effectiveness of such programming in various ways. Hopefully, a comprehensive program will reduce the number of public inebriates and improve the health of those remaining in the subculture of skid row. It is expected that the program will demonstrate that alcoholic people will be better served through a health care system rather than a criminal justice system.

It is also anticipated that the health care system will prove to be a financially feasible alternative to the criminal justice system in the care of the public inebriate. It is expected that system in the care of the public inebriate. It is expected that an intensive in-patient rehabilitation program will be effective when provided for the less acculturated, nomhard-core skid row type. Another objective is that the transitional residence will be shown to be therapeutically advantageous to those clients in that subculture who would wish, at least initially, to adhere to the values of skid row.

It is intended that through close coordination with the police and other service agencies, the program will assure adequate care and prevent the revolving door life of the drunkenness offender. It is hoped that through the presentation of this grant award communities will utilize the potentialities of their existing facilities for the public inebriate. This is particularly true of medical services that could be made available for detoxification.

Finally, it is expected that after a three-year period of operation the value of comprehensive approach for the public inebriate would have been demonstrated to a community and the community could then continue a comprehensive public inebriate program from its own resources, independently or in conjunction with a program for the general public. This total venture should be of use in facilitating a conjoint effort of Federal Government agencies in a more thorough response to the major problems of that subculture.

DRINKING DRIVER PROGRAM

IDENTIFICATION AND TREATMENT OF DRINKING DEIVERS

The Institute has collaborated with various Federal, State, and local agencies in developing programs aimed at reducing and preventing alcohol-related problems in special population groups. One of the most significant of these is a joint effort with the National Highway Traffic Safety Administration of the Department of Transportation which seeks to reduce the number of deaths and injuries caused by drinking drivers.

On January 11, 1972, the Secretary of Health, Education, and Welfare and the Secretary of Transportation made a joint announcement of a 10-point collaborative program. Under this agreement, DOT's information campaign on drinking and driving was coordinated with the NIAAA information and education program on the misuse of alcohol. Other areas of cooperation include consultation and assistance in the development of the DOT community-oriented Alcohol Safety Action Projects (ASAP), coordination of research findings and evaluation.

Thirty-five sites were approved for the Alcohol Safety Action Program by the Department of Transportation.

NIAAA approved for funding projects in 26 of the ASAP sites as well as in communities outside ASAP sites with substantial drinking driving problems. With the utilization of DOT "402" funds, "mini-ASAP" programs were developed. Sixteen

programs, initiated in FY 1972, were continued in FY 1973 for \$1,999,599.

The special concerns and directions of this program include:

- -- Utilization of the highway safety efforts of the Department of Transportation in a public health sense.
- -- Identification of individuals early in the course of problems with alcohol abuse or alcoholism.

In this way it is hoped that the progression of the problem can be stopped. A new element is the choice of those accused of driving while intoxicated to accomplish this goal. Also sought is a change in the attitudes of police officers, judges, and probation officers toward acceptance of the concept of alcoholism as an illness and to direct offending individuals to treatment. The personal crisis of being arrested is used for the accused offender as a means of encouraging these persons to remain for treatment on a specific time basis unique to them. Grant projects focus on developing services responsive to those individuals who will be arrested for driving while intoxicated. Special emphasis is on providing outpatient care to those who are working or have families, and to the young alcohol abuser. The projects, by providing beneficial reeducational and treatment services, can also make the highway safety program meaningful in an impact on the driving habits of drinking drivers. The theme will be that while driving intoxicated is an offense, alcoholism is not an offense but an illness requiring the best of treatment.

,这个人,我们是这个人,我们是这个人,我们是这个人,我们是这个人,我们是这个人,我们是这个人,我们是这个人,我们是这个人,我们们是这个人,我们们们的一个人,我们

The public inebriate, drinking driver and the criminal justice population alcohol programs have, since their initiation and development, created a unique situation. Consequently, several other Federal agencies have demonstrated a need to be responsive to a common problem requiring collaboration, cooperation, coordination, and a combination of resources between the health care systems and their public safety efforts involving alcohol.

DIVISION OF PREVENTION

The Division of Prevention became operational in September 1972. Prevention and control of alcohol abuse and alcoholism, the objective of this Division, is one of the two major objectives of the Institute. The other is to make available treatment and rehabilitation services to alcoholic people and problem drinkers when and where needed. Prevention and control of alcohol abuse and alcoholism is a vital element and primary goal of a national social/health policy and strategy.

The Division of Prevention has been given responsibility for the Institute's prevention activities related to alcohol abuse and alcoholism as delegated to the Institute by P.L. 91-616, the Comprehensive Alcohol Abuse and Alcoholism Prevention, Treatment, and Rehabilitation

It is the Division of Prevention's position that no uniform parameters exist in this country concerning the responsible use of alcohol. Until the current ambivalence is confronted and resolved such that the consumption of alcohol is within the guidelines of responsible usage, we will continue to have problems as a Nation with the drug, alcohol. The Division of Prevention is developing strategies directed at this primary goal.

The Division includes three Branches: the Youth Education Branch, the Community Prevention Branch and the National Center for Alcohol Education.

The Division's three Branches develop, implement and evaluate alcohol abuse and alcoholism prevention programs to meet the needs of a heterogeneous American society in which more than 100 million Americans are drinkers or users of alcoholic beverages.

A total of \$3,647,136 was expended for Prevention grants and contracts. The Division awarded a total of eight grants amounting to \$1,018,961, five contracts amounting to \$668,175, and a contract amounting to \$1,960,000 for the administration of the National Center for Alcohol Education.

Youth Education Branch

The Youth Education Program directs its efforts primarily at the Nation's youth who represent a major segment of the population, and their parents from whom attitudes and lifestyle practices, important to alchol abuse and prevention, are first learned and developed.

de

During FY 1973, six grants were awarded in the amount of \$417,486 to develop pilot approaches relevant to meeting the needs of young people in a variety of settings, and four contracts amounting to \$593,173.

NATIONAL YMCA ALCOHOL EDUCATION PROJECT

The National YMCA Alcohol Education Project, designed for students in grades 4-6 and their parents, utilizes a YMCA in Akron, Ohio, to develop a model program for utilization by Y's in the national organization. The amount of this grant was \$90,392.

PEER GROUP DEMONSTRATION

Another project utilizing other than the traditional school setting but complementary to the classroom approach is the "Peer Group" demonstration project. This approach utilizes older students to work with younger students (college with high school; high school with junior high and elementary), in an inner city area of Philadelphia, Pennsylvania. The amount of this grant was \$124,727.

SCHOOL/COMMUNITY PROJECT FOR DEVELOPMENT OF GUIDES FOR LIVING AND WORKING TOGETHER

In a rural setting, Holland Patent, New York, a school/community project, involving school-age youth and parents, seeks to develop guides for living and working together and meet the growth and development needs of young people in this setting. The project incorporates those elements of growth, development and learning important to equip young people to be able to participate in the system. Such areas as attitude development, socialization, self-ewareness, value clarification, decision-making and coping skills are stressed. This grant amounted to \$50,545.

nan-richter son der Gantsbergen Regener gegener gegener gegener gegener gegener gegener gegener gegener gegene

- VISUAL AIDS DEVELOPMENT TO STIMULATE DISCUSSION AMONG YOUTH

The fourth grant was for a project applicable to both the traditional and nontraditional settings for learning and calls for the development of visual aids designed to elicit and stimulate discussion among youth. The grant was made to the University of Michigan, School of Public Health for \$23,883.

- MASS MEDIA DETERMINATION IN RELATION TO PARENT AND PEER INFLUENCE

Other special projects relevant to the prevention of alcohol abuse and alcoholism include a study to determine how mass media works in relation to parent and peer influence, particularly in the socialization process and the communications patterns between parents and adolescents. This study, part of a larger study, is at the Department of Journalism, University of Michigan. This grant award amounted to \$28,295.

-- CHILDREN OF ALCOHOLICS

This study focuses on children of alcoholic people, a high risk group with special prevention needs, to determine ways in which they are able to cope with living practices and stress in their lifestyles. The amount of the grant was \$99,644.

Contracts awarded within the scope of the Youth Education Branch, involved:

A MODEL LEARNING SYSTEM IN ALCOHOL ABUSE AND ALCOHOLISM PREVENTION FOR KINDERGARTEN LEVEL

In this environment, the more traditional locus of learning, the school, a model learning system for grades kindergarten through 12 was initiated. This contract amounted to \$223,375.

THE PARENTS AS A MODEL FOR CHILDREN — COLLABORATIVE PROGRAM WITH NATIONAL CONGRESS OF PARENTS AND TEACHERS

Another national citizens voluntary organization with whom a collaborative program was developed is the National Congress of Parents and Teachers. This program was continued in 1973 with greater emphasis on the role of the parent as a model for children in their total learning experience. This contract amounted to \$70,000.

DRINKING BEHAVIOR OF HIGH SCHOOL STUDENTS

Experiences of the last decade, pinpointed more recently by the report of the National Commission on Marihuena and Drug Abuse, showed that alcohol was the most abused drug among adults and teenagers in this country. A survey had been initiated to obtain baseline data on drinking behavior among junior and senior high school students and to obtain data important to program development among teenagers, such as circumstances of teenage drinking, attitudes and contexts concerning alcohol use and abuse, and the \$194,800.

- ASSESSMENT OF CURRICULUM MATERIALS AND TEACHER TRAINING

Other projects included a study to assess the kinds of curriculum materials currently available for alcohol information and the availability and kinds of teacher-training classroom teachers receive. The assessment revealed a dearth of both. This contract was for \$105,000.

The Division of Prevention was represented during FY 1973 at seminars and workshops of organizations, such as the Southern Regional Education Board, the Hugh O'Brian Youth Leadership Foundation and the Presidential Classroom for Young Americans.

Community Prevention Branch

During FY 1973, two grants were awarded in the amount of \$601,475 and two contracts amounting to \$2,035,000. Developing and evolving a national health policy and strategy must provide opportunity for people, participants and beneficiaries, to become involved. In terms of the prevention and utilization of resources, people participation and involvement is essential. The four grants and contracts in the Community Prevention Branch involved:

U.S. JAYCEES, NATIONWIDE EDUCATIONAL PROGRAM

To develop the broad-based citizen's awareness of alcohol abuse and alcoholism programs and gain citizen participation, the cooperative, nationwide educational program, begun in 1972 with the U.S. Jaycees, was continued in 1973. The U.S. Jaycees, through chapters and membership, is involving other groups from the private and public sectors in communities. This grant award was for \$544,850.

SMALL BUSINESS -- LEVEL OF AWARENESS AND NEEDS TO UTILIZE ALCOHOL ABUSE, ALCOHOLISM PREVENTION PROGRAMS

The small business work setting offers opportunity for early identification and prevention of social health problems. Utilizing business techniques, this potentially untapped Utilizing business techniques, this potentially untapped market will be assessed to determine the level of awareness, understanding, readiness, and needs to utilize alcohol abuse and alcoholism prevention programs. This project is being and alcoholism prevention of the country, focusing on covered in a southeast section of the country, focusing on the small business sector of the economy, which accounts for about 40% of job opportunities. This grant award amounted to \$56,625.

VOLUNTARY CITIZENS GROUPS TO ADDRESS EFFECTIVE RESOLUTION TO ALCOHOL ABUSE THROUGH EDUCATION

In 1973, a new cooperative program was initiated with the Education Commission of the States (ECS), located in Denver. The program activities were complemented and strengthened by volunteer citizen groups. The Commission's membership comprised the Governor,

legislators and citizens from each State. The purpose of ECS was to provide a mechanism for States to work together on addressing common issues. In this instance, the purpose was to bring about a practical and effective resolution to alcohol abuse and alcoholism through education. The contractor developed a plan to create an understanding of alcohol abuse prevention education needs among selected systems, including schools, higher education, policy making, health care, voluntary and official agencies to implement a national alcohol abuse prevention program. The cost of this contract was \$75,000.

NATIONAL CENTER FOR ALCOHOL EDUCATION

During 1973, the Institute sponsored the establishment of a National Center for Alcohol Education. The primary goal of the Center was the creation of an exemplary education center where leaders in a variety of fields — business executives, mayors, governors and health providers working in the alcohol field — may come together to pursue the solving of issues and develop more effective approaches to alcohol abuse and alcoholism. It is also to serve as a model for the development of Regional Centers.

Other components of the Center include:

- An Experimental Education Laboratory for educating alcoholism program practitioners and educators.
- -- A Resident Scholar Program in which distinguished behavioral experts will develop scholarship and multidisciplined professional expertise in the field.
- A Resident Fellowship Program for recently graduated behavioral scientists.

The Center provided the Institute with a perpetual flow of current, factual baseline data from a wide spectrum of interests in the private and public sectors. These will enable the Center to mount a comprehensive survey of education and training programs for private and public resources related to the delivery of services in alcohol abuse and alcoholism. The expected results of this survey will identify and highlight effective program components, gaps and needs toward which future Federal initiatives should be directed, for example, in terms of National Health Policy and National Health Insurance.

The function of the Center was administered and performed by contract during FY 1973 for the amount of \$1,960,000.

The Division of Prevention recently undertook the monitoring of the National Clearinghouse for Alcohol information contract and has also utilized this important element of the Institute's program to facilitate the sharing of prevention and other relevant data with a variety of groups and organizations at National, State and community levels.

The state of the s

we are a way of the state of a state of the state of the

DIVISION OF RESEARCH

Extramural Research Branch

During Fiscal Year 1973, the Extramural Research Branch received 182 applications for research grants for projects on a wide variety of problems associated with the use and abuse of alcohol. This was an increase of 100 percent over the number of applications received in the first year the Institute was established. Seventy-eight applications were recommended for approval and these were added to approved applications carried over from Fiscal Year 1972. Thus, a total of 103 merit and be worthy of funding during Fiscal Year 1973.

At the close of Fiscal Year 1973, the Extramural Research grants program had funded 10 new or competing renewal applications, 78 noncompeting renewal applications, a grant of \$60,000 for review committee costs, and several contracts and research career development awards for a total of 102 grants and contracts funded for \$6,472,000. A table funded 5) showing the categories of the 88 regular research grants funded and a distribution of funds is appended. (Table 5, page 44)

In addition to the above were 23 projects designated as health initiative projects in the amount of \$2,183,045, specifically focusing on health care services, new techniques for improving the productivity of the medical system, and innovative projects in alcoholism research.

Inder the guidelines of the health initiative program, grants were swarded for the psychological and medical treatment of alcoholic patients, for the assessment of drinking problems and practices of urban American Indians, cross-cultural studies of problem drinking in Irish-Americans, the identification of employed alcoholic persons and their supervisors' attitudes toward their drinking problems and for the drinking driver problem. In a few instances, preliminary findings are presented at the NIAAA Annual Conference (page 41).

der the aegis of the regular grant program, 88 projects were funded or a total of \$5,433,000. Grants were awarded for basic and applied tudies on behavioral and biomedical aspects of the effects of alcoholouse, treatment and rehabilitation, prevention and on the etiology of looholism.

GRANTS FOR UNIVERSITY-BASED CENTERS

During Fiscal Year 1973, funding was continued for three grants awarded to university medical schools for the support of multidisciplinary research programs. As initially conceived, the centers were

established for the purpose of conducting research from a variety of perspectives including psychiatry, psychology, biochemistry and physiology, and to recruit scientists into alcoholism research. A number of centers were established, reaching a maximum of seven a number of centers were established, research became more widespread, in FY 1969. As interest in alcoholism research became more widespread, it was found that the direct stimulation and recruitment of qualified researchers through the support of Centers was less practical; consequently, funds were increasingly provided for support of individual projects. In the future, researchers currently supported by funds from Center grants will be encouraged to submit applications on an individual basis.

BIO-MEDICAL STUDIES

The largest number of grants and dollars were awarded for basic and applied research into biological aspects of alcohol effects. Interest continues in the etiology of liver cirrhosis and other alcohol-related diseases, and the study of the withdrawal syndrome and its treatment. There is considerable research interest in identifying the mechanisms and enzymes responsible for the metabolism of alcohol. Several research groups are currently attacking the problem and making determinations as to whether alcohol is metabolized solely by two or three enzymes. Recently, the Institute sponsored a scientific meeting bringing together the world's leading authorities to discuss this research area, to chart new research directions and to avoid needless duplication of research efforts. The findings from relevant studies in this area should bear importantly on the development of methods for enhancing the efficiency of eliminating ·alcohol from the body and for understanding the mechanism of liver pathology associated with alcohol abuse. In this connection, one recent study suggested the possibility of experimental induction of alcoholic hepatitis.

Along similar lines, there is continuing interest in the development of an agent which could block the effect of alcohol on the brain. Subsequent to earlier more optimistic reports, it was found that neurochemical intervention of alcohol's intoxicating effects is not easily achieved. The problem is a difficult one but one which would pay off well if a breakthrough were to be obtained. A substance which would reduce or prohibit the effects of alcohol on the brain would be of considerable value in treatment as well as during the rehabilitation process.

Biomedical scientists have recently demonstrated a possible association between chronic alcohol abuse by mothers and birth defects of their children. Although the research included only a small number of children, the Institute is vitally interested in investigating the phenomenon and is actively stimulating research on this subject. Studies should be conducted to determine the prevalence, type and severity of birth defects, their permanence or reversibility and susceptibility to treatment, possible implication of paternal alcoholism, and the possible induced predisposition to alcoholism in later years among children of alcoholic parents. The potential findings of a program of research in this subject area would have far-reaching implications for early identification and treatment of children of alcoholic parents and primary prevention of alcoholism.

-- STUDIES OF TREATMENT

The Extramural Research Branch continues to emphasize the need for research on treatment methods. The number of clinical research projects funded by the Branch has doubled since the Institute was established, and now accounts for 27% of research grants funded in FY 1973. From another perspective, the increasing redirection of the research grant program is reflected by the shifting emphasis to applied research. For instance, in FY 1970, the last fiscal year prior to the establishment of the Institute, the percentage of basic and applied projects were 70 and 30, respectively. For FY 1973 the percentages were 59 and 41, respectively.

Projects regarding treatment and rehabilitation are focused on socio-psychological approaches to the treatment of alcoholism and the medical management of the alcoholic patient. Research continues to be conducted on the family having an alcoholic member. These studies will report on communication patterns within such families; the function of alcohol and the role played by the alcoholic person; and methods used by families to cope with alcoholism. One study which received initial funding last year sought to evaluate two groups of women - members of a voluntary organization and members of a church -- with respect to dealing with alcoholism in the family. The research is still in the preliminary stage; however, early findings suggest that parish women exhibit greater stability in terms of length of time living in the area, broad social networks of kin and friendships, more religious activity and professed greater faith. A collateral, provocative, finding indicates that wives of alcoholic spouses have had no meaningful communication with them since the inception of the marriage.

Additional projects to study interactional patterns between married couples having an alcoholic spouse and the development of therapy procedures, patterns of alcohol use in rural communities, and the development of differential treatment for alcoholic subgroups were recommended for approval and await funding in Fiscal Year 1974.

W PROJECTS

our new projects were concerned with treatment efforts: the use of alfway houses for American Indians, identification and treatment of coholic women, the analysis of alcoholism treatment networks for thancing the delivery of services to alcoholic patients and the nvestigation of a chemical substance having possible anti-alcohol ffects.

THER ACTIVITIES

n important program activity of the Extramural Research Branch is to dentify and stimulate research in underdeveloped or promising areas. In addition, the Branch has the responsibility of facilitating the dissemination of new research findings in order to enhance their rapid utilization by the therapeutic community and to provide a forum for researchers to communicate with other scientists on problems of mutual interest. To accomplish these objectives, the Branch plans and interest the Annual Alcoholism Conference, smaller conferences on specific problem areas and research workshops.

AMNUAL ALCOHOLISM CONFERENCE

The Third Annual Alcoholism Conference was held in Washington, D.C. on June 20 - 22 at the Shoreham Hotel.

The first day's program contained special addresses by Dr. Charles C. Edwards, Assistant Secretary for Health; Dr. Bertram S. Brown, Director of the National Institute of Mental Health, and Dr. Morris E. Chafetz, Director of the NIAAA.

Two invited addresses were presented: "Is Alcoholism Inherited?" by Br. Donald W. Goodwin, Associate Professor of Psychiatry, Washington University School of Medicine, and "Treatment: What is Happening" by Dr. Lawrence L. Weed, Professor of Medicine, University of Vermont. These two addresses reflected the two major themes of the Conference focusing on research and treatment.

The research theme, "Alcoholism: A Multilevel Problem", was grouped into three different aspects of alcoholism: psychological, biomedical and socio-cultural research.

A total of ll scientific papers was presented on such diverse topics as coping with alcoholism in micule age; drinking and driving of young men; cardiac toxicity of alcohol; lithium therapy in chronic alcoholism; psychosocial typology of adolescent alcohol and drug users; and executives and problem drinking employees.

The treatment theme, "Treatment: Organization and Management", was focused on planning a treatment program, panel discussions of treatment approaches in the industrial and community settings, and such specialized programs as self-help groups, military treatment units, and programs associated with traffic safety.

The Conference was an undoubted success as evidenced by the fact that approximately 1,400 persons were registered. This compares with an attendance of about 700 individuals last year and 300 the year before. The success of the Conference is seen as indicative of increasing awareness of alcoholism as one of the Nation's major health problems and the people's desire to do something about it.

SATELLITE CONFERENCES

The Branch awarded two grants to conduct conferences on specialized topics. One conference, a symposium on alcohol and aldehyde metabolizing systems, was partially funded by an NIAAA grant and was held on July 9 - 11, 1973, in conjunction with the IXth International Congress of Biochemistry in Stockholm. The purpose of the conference was to bring together world authorities in this field, to review in a comprehensive manner the most recent findings regarding the enzyme systems responsible for metabolizing alcohol, and to set new directions for future research.

A second satellite conference was held in Chicago, August 28 - 30, 1973 in conjunction with the IXth International Congress of Anthropological and Ethnological Sciences. The conference provided a timely appraisal of the status of cross-cultural studies of alcoholism and presented recommendations for research regarding the cultural and national influences on alcohol drinking practices and abuse of alcohol.

RESEARCH WORKSHOPS

The workshop mechanism is designed to bring together a small number of experts, to discuss a specific problem area in alcoholism. Although no workshops were conducted during FY 1973, plans have been tentatively formulated to hold one in the coming year on the role of alcohol in the context of the family.

PROGRAM EVALUATION

The Branch participated during the past year in an evaluation of the research grant program undertaken by the National Institute of Mental Health. The draft report of the task force was submitted describing the accomplishment of research on alcoholism supported by Federal funds. The report was evaluative and contained recommendations regarding the effectiveness of the mechanism for providing research support and suggestions for improvement.

COLLABORATIVE RESEARCH

In addition to the above activities, staff of the Extramural Research Branch conducted research in collaboration with non-Institute scientists. Results from two such studies were published during the year while a third manuscript was submitted for publication. One study was concerned with the identification of personality characteristics of alcoholic patients, the other was addressed to the problem of identifying alcoholic persons by means of a national driver register. A third project investigated the records of single-car fatal accidents and associated epidemiological factors.

ARRANA MARIA M

NATIONAL INSTITUTE ON ALCOHOL ABUSE AND ALCOHOLISM

Extramural Research Grants*

FY 1973

		Grants	Dollars	ars	Average Amount
	Number	Percent	Number	Percent	Per Grant
Centers	m	m	\$ 658,000	15	\$ 219,356
Biological	113	149	2,033,000	ĵτ	147,277
Behavioral	1.1	. 20	950,000	1.8	55,882
Clinical	20	23	807,000	15	40,350
Prevention & Education	.	m	635,000	. 12	211,667
Community Research	 1	H	16,000	ł	16,000
Surveys/Conferences	г	ı	245,000	٠.	245,000
Research and Evaluation	į.	į	29,000	1	29,000
Review Committee Grant		1 ·	60,000		000,09
TOTAL	88	1001	\$5,433,000	100%	\$ 61,739

* The grants do not include Health Initiative Grants

July 1, 1973

MTRAMURAL RESEARCH PROGRAMS

ABORATORY OF ALCOHOL RESEARCH

in addition to grant support of research investigations, the Institute perates its own research activities. The Intramural Laboratory of alcohol Research is located at Saint Elizabeths Hospital, Washington, D. C. The laboratory program is focused upon an interdisciplinary analysis of the basic biological and behavioral correlates of alcoholism in man and examination of the development of alcohol addiction in experimental animals and the development of new treatment modalities for treating alcoholic people.

The program has three main thrusts:

The Clinical Program is engaged in studies of behavioral aspects of alcoholism, particularly as it relates to interaction within the family that uses and abuses alcohol and in the development of therapeutic procedures.

The Biochemistry Program conducts research into the mechanisms of importance in the metabolism of alcohol and on other bodily functions associated with alcohol ingestion abuse and withdrawal.

The Behavior Program is engaged in biobehavioral research on humans and experimental animals directed toward the clarification and understanding of the addictive process in alcoholism and the effects of alcohol ingestion.

In addition to research activities, staff members are actively engaged in a number of educational activities at major medical schools and in the training of scientists in its own laboratories.

Basic research on alcohol metabolism is also supported, through direct allocation to investigators in the NIMH intramural research program.

During Fiscal Year 1973, personnel costs for the Laboratory of Alcohol Research were \$324,043. Other direct operations for the Laboratory of Alcohol Research were \$107,113. Maintenance support on the facilities, clinical research ward and animal laboratories occupied by NIAAA at Saint Elizabeths Hospital amounted to \$18,000. Total expenditures for intramural research during Fiscal Year 1973 totaled \$449,156.

During FY 1973, staff of the Laboratory of Alcohol Research published a total of 18 reports in scientific journals and made 14 presentations at scientific meetings.

Collaborative research studies were developed by Laboratory staff with a number of Federal and non-Federal institutions.

Several important findings in the biochemical and behavioral areas resulted from the investigations conducted at the Laboratory of Alcohol Research during FY 1973:

- -- Liver Disease: Alcohol addicts with a familial disorder of serum lipo-proteins (Type IV Hyperlipidemia) were found to develop striking elevations in tryglyceride levels during experimentally induced alcohol intoxication, in contrast to controls. Since alcohol induced changes in serum lipid levels are closely associated with fatty changes in liver which may eventually contribute to the development of cirrhosis, these data suggest that alcohol addicts with a Type IV familial disorder may be a high risk for the development of liver disease.
- Memory Function: Alcohol addicts, with and without a clinical history of alcoholic "blackouts", did not differ in accuracy of performance on a behavioral task designed to assess short-term memory function and all subjects performed accurately even at very high blood alcohol levels. These data suggest that the alcoholic "blackout" probably cannot be accounted for by an alcoholic's specific disruption of short-term memory and also indicate the degree of "behavioral tolerance" for alcohol developed by the chronic alcohol addict.
- Aggression and Testosterone: Alcohol dramatically suppresses serum testosterone levels in alcoholic subjects, in comparison to baseline levels. Aggressivity is often associated with elevated testosterone levels, but aggressive behavior during intoxication was accompanied by abnormal suppression of testosterone. Studies of androgen-estrogen ratios are in progress. Disorders of androgen metabolism may be reflected in the testicular atrophy and gynacomastia often seen in chronic alcohol addicts.

Models of Alcoholism: Alcohol dependence can be rapidly induced in rats via maso-gastric alcohol administration within five to seven days. Reliable induction of alcohol dependence in a rodent is essential for biochemical studies

of the basic biological factors in alcohol addiction. This procedure has several advantages over techniques which require 30 days for the induction of dependence or which depends upon other pharmacological agents to manipulate alcohol metabolism.

- Elochemical Studies: A number of studies have been conducted to examine the effects of alcohol on brain and blood chemistry. One study suggests that the accumulation of methanol may be implicated in the alcohol withdrawal syndrome. Another study indicated that alcohol-induced degeneration of fetty liver results from multiple opposing effects produced at various sites in the body.
- Other Studies: Other studies have also been conducted to examine the effects of alcohol on electroencephalographic sleep patterns; social interaction in alcoholic couples; sleep patterns of a therapy program based on family and multiple couples therapy; and potential alcohol antagonists.

In the Intramural Laboratory, experiments are designed so that findings in any single discipline would have a potentially meaningful relationship to research in other disciplines. The clinical research paradigm ship to research study of the biochemistry and behavior of used permits concurrent study of the biochemistry and behavior of alcohol addicts prior to, during, and following a period of experimentally induced intoxication.

Three closely related areas were examined:

- Correlation of a number of biological factors with behavioral observations of alcoholic subjects during sobriety, experimentally induced intoxication and alcohol withdrawal.
- Analysis of drinking patterns of alcoholic subjects and concurrent study of behavioral tolerance for alcohol, including the examination of alcohol effects on affect, memory and states of consciousness.
- The development of an animal model which meets the pharmacological criteria of addiction to alcohol and study of the effects of experimentally induced alcohol addiction on behavioral and biological factors.

TRAINING

Extramural Training

The primary task of the Institute's training program is to effect a change in attitudes and behavior toward alcoholic people and problem drinkers through the development of qualified personnel in the areas of prevention, treatment, and rehabilitation. The development of personnel to combat alcoholism has had a brief history, compared to other training efforts in the health field. In addition, alcoholic people have some problems that cannot be compared to others in need of health care. The alcohol abuser has to a considerable extent been avoided by health care practitioners who do not wish to provide treatment and who justify such nontreatment on the grounds that alcoholism is a moral rather than a medical problem or in the belief that it is untreatable. This negative attitude is characteristic, not only of some health practitioners, but of institutions of higher learning, community agencies, and State and local organizations.

In order to change these basic attitudes, extramural training during Fiscal Year 1973 funded the training of professionals and paraprofessionals. This was achieved by facilitating the inclusion of alcoholism training through grant support in such professional fields as medicine, social work, public health, psychiatry and psychology. The importance of paraprofessionals and lay workers to alcohol abuse and alcoholism services as well as to the national health care system was enhanced by the development of a new career program established by the extramural training staff.

The Institute funded 59 training grants amounting to \$4,979,000 and three fellowships for \$18,000, or a total of \$4,997,000. Of the 59 grants, 12 were new grants, five competing renewals and 42 non-competing renewals. (Table 6, page 51)

Many of the new programs were short-term, less than one year, and had leasonable expectation of partial funding from other sources. Almost all of the new programs had strong ties with State or community organizations; they were broad-based, with strong community support, and it is anticipated that they will continue to be supported in the community with the termination of Federal funding.

No of the new programs had clearly defined ethnic targets, the North American Indian and the multidisciplinary program based in Puerto Rico for the Puerto Rican population.

Two consortium programs embrace a number of organizations in the community under a single umbrella and one new program is for training recovered alcoholic people as counselors in an inpatient clinic which has very strong community support and which will, without any doubt, be supported by the community when Federal support terminates. The emphasis here was not on traditional support programs in terms of disciplines and educational levels. The Institute premise is that the development of manpower should be for definite programs needing definite numbers of personnel with specific kinds of training.

TRAINING FOR SPECIFIC GROUPS

The Institute perceives that training for three distinct groups of people in three different roles is indicated:

1. COUNSELORS

The first group, counselors (usually individuals with less than professional training) provide most of the direct treatment services. Counselors have had success in working with alcohol abusers and have displayed a willingness to work in an area which professionals have heretofore shunned.

2. PROFESSIONALS

The second group is composed of professionals who have acquired positive attitudes and recognize that alcoholic people can be helped. Independent of their disciplines, professionals are responsible for the supervision and training of personnel with less experience or training. In addition, they provide direct treatment services when necessary, provide leadership in treatment and administration, develop new programs, provide for a continuity of care integrating alcoholism services into a total health care delivery system, undertake research and continuously evaluate all programs for effectiveness.

3. "GATE KEEPERS"

A third group is composed of those members of a community who are in a natural posture to provide entry into an alcoholism treatment system. This group includes clergy, physicians, attorneys, teachers, Indian medicine men, police, government officiels; in short, any group to whom people in trouble turn for help. Successful prevention, treatment and rehabilitation programs require the combined efforts of all three groups.

CONTINUING EDUCATION PROGRAMS

Increasingly, emphasis is being given to continuing education programs which can meet the immediate need for trained personnel in the shortest period of time, with limited funding, by focusing on individuals who are already trained and employed in related areas. Continuing education can also be the mechanism to upgrade the skills of alcoholism workers and to retrain those who wish to shift careers in response to the needs of alcoholic people.

JOINT AGENCY TRAINING

One ongoing developmental effort commencing in Fiscal Year 1973 which merits increased emphasis is a joint program with the National Institute of Drug Abuse of the Alcohol, Drug Abuse, and Mental Health Administration, to develop leadership capabilities in the addiction field in medical schools and schools of public health. This effort has as its goal the provision of leadership capabilities by training one faculty member in each institution.

The first of the second of the

FY 1973

\$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$	Number of Grants	Amount of Funds	Average Amount Per Grant
Type of training	35	\$1,532,861	\$ 1,3,796
Professionel Nonprofessional	17	3,0111,628	179,096
Professional and		1,01,127	57,304
Nonprofessional	59*	\$4,978,616*	84,383
SUBIUIAL	m	18,000	000*9
Fellowships	67	\$1,996,616	
TOTAL	V 00		

The 59 training grants consist of: 12 new grants in the amount of \$554,000, 5 competing renewals in the amount of \$113,000 and 42 noncompeting renewals and several supplements in the amount of \$4,312,000 for a total of \$4,979,000.

et in tele andre bleve en et et in en translation abbedication absoluteite a homelide et betice et en en en en

PUBLIC AFFAIRS

During FY 1973, the Institute encompassed a wide range of efforts aimed at increasing public awareness of the facts about alcohol use and abuse and developing responsible attitudes toward drinking.

Functions performed included the following areas:

- Collection and dissemination of scientific and public information through the National Clearinghouse for Alcohol Information.
- -- Public service education campaign.
- Media contacts.
- Preparation of publications.
- -- Support services.

NATIONAL CLEARINGHOUSE FOR ALCOHOL INFORMATION (NCALI)

NCALI, the information arm of the Institute, was established in June 1972, to gather, systematize, maintain, and disseminate a comprehensive body of knowledge on alcohol abuse and alcoholism. The first year's operation of the Clearinghouse was funded with a \$993,000 cost-plus-award-fee contract with the General Electric Company which was renewed in FY 1973 in the amount of \$1,897,700.

Fiscal Year 1973 represents NCALI's first full year of operation. During this time, the Clearinghouse established a broad range of services to meet its goal of providing a national focal point for the collection and dissemination of alcohol information to the general public, physicians, researchers, counselors, and alcoholic people and their families. These services include:

USER CULTIVATION AND CURRENT AWARENESS

This NCALI service helps scientists, doctors, educators, and other professionals keep abreast of the latest alcohol-related information in their given specialty. During FY 1973, 1,100 professionals and paraprofessionals were registered to receive abstracts of newly available documents, and 20,000 persons subscribed to the monthly newsletter and quarterly bulletin provided as a public service.

MIALYSIS AND REFERENCE SERVICE

This service answers mail and telephone inquiries from professionals and the general public. To serve the specialized needs of health professionals and others working in the alcoholism field, the Reference Service provides computer searches of the alcoholism literature and specialized bibliographies. This service reached over 24,000 persons directly during FY 1973, and nearly a million persons through secondary distribution of materials.

DOCUMENTATION ACQUISITION AND LIBRARY

The main function of this unit is to procure scientific and general materials on alcohol abuse and alcoholism, including books, pamphlets, reprints, reports, audio-visual materials, newspaper clippings, newsletters and abstracts gathered from around the world. The section also maintains a reading room and library and notifies the Institute and interested professionals of new acquisitions. The Acquisitions Section has obtained some 30,000 items.

SYSTEMS PROCEDURES AND COMPUTER PROGRAMMING

This group developed the systems and computer programs needed for information retrieval, maintenance of user registrations, and correspondence files. The unit processed thousands of data entry items each quarter, prepared meiling lists and user statistics and produced semi-automated mailing of current awareness materials.

TECHNICAL PUBLICATIONS

This unit produces a monthly newsletter and a quarterly bulletin. The newsletter, Alcohol and Mealth Notes, provides summaries of the latest developments in research, treatment, rehabilitation and prevention programs, governmental activities, listings of publications and notices of national and international conferences. Seven issues were printed during FY 1973 and distributed to individuals and organizations in alcohol-related fields. The first issue of the quarterly bulletin, Alcohol Health and Research World, was published during FY 1972. The Bulletin is aimed at providing in-depth information on research, treatment, training, education, and prevention to professionals and paraprofessionals in the alcoholism field. The first issue was distributed to an audience of 7,000.

WAREHOUSE AND DISTRIBUTION SERVICES

The warehouse keeps an inventory of alcoholism information materials, totaling some three million items. The unit sends material to requestors and has mailed two million items during this fiscal year.

COORDINATION WITH OTHER AGENCIES

NCALI also provided information support services to other Federal agencies concerned with the alcoholism problems. During FY 1973, negotiations were concluded with the Department of Transportation to answer its public inquiries concerning alcohol and highway safety. NCALI also supplied information and consultation pertaining to public information to the Department of Defense, the Veterans Administration and the Civil Service Commission.

PUBLIC SERVICE EDUCATION CAMPAIGN

NIAAA's nationwide public awareness campaign which began in February 1972, was continued in Fiscal Year 1973 with the development of new radio and television spot announcements. The thrust of this effort was to awaken the public to the widespread problem of alcoholism and to counter harmful myths surrounding drunkenness and alcohol problems. In FY 1973, NIAAA received two awards for the best Public Service Campaigns for calendar year 1972 from the New York Film and TV Festival and the International Cannes Film Festival. Because of the excellent quality of the material and the recommended acknowledged need by the media to further messages to the public, the Institute received a large share of the public service time available.

MEDIA CONTACTS

NIAAA coordinates speaking engagements, newspaper and magazine interviews, and appearances on radio and television for the Institute Director and senior staff. FY 1973 saw an intensified program of media contact as part of the Institute's overall effort to raise the level of public awareness of alcoholism problems. Personal contacts were made with radio and television stations throughout the country were made with radio and television stations throughout the country to encourage them to give maximum exposure to the Institute's new radio and TV materials. A program of increased personal appearances by the Director on key radio and television shows was initiated and, during the year, Dr. Chafetz and senior staff were able to speak for the Institute on major networks as well as local broadcast programs.

PUBLICATIONS

One of the predominant efforts of NIAAA involved the preparation of publications to better respond to the ever-increasing interest of the professionals and the general public that has been generated and the Current Awareness activities of the National Clearinghouse for Alcohol Information. Publications aimed at scientists and other professionals included the Proceedings of the First and Second Annual Alcoholism Conference of the NIAAA, Proceedings of the Joint Conference on Alcohol

use and Alcoholism, Alcoholism Emergency Care Services, and cupational Alcoholism: Some Problems and Some Solutions, and ecialized bibliographies on various aspects of alcohol and coholism. In addition, work was begun on a series of publications med at the general reader.

PPORT SERVICES

MAAA provided professional communications and information services or Offices and Divisions of the NIAAA. A highlight of this support ctivity in FY 1973 was the Third Annual Alcoholism Conference. blic Affairs also provided a press room, exhibits and information sterials, and continuous film showings throughout the 2 1/2 day onference. Other support functions included the development of viblications, press releases, reports, and speeches for the Institute.

HEALTH INITIATIVE PROGRAM

a result of the President's Health Initiative Message of February, 71, NIAAA awarded, toward the end of FY 1972, 51 grants in the amount \$7,033,222 of which 31 were in the research area and 20 in the monstration area. These grants and contracts focused on research, on w techniques of improving the productivity of our medical system with phasis on pilot experimental and demonstration projects. They dissented the results and encouraged the health industry and medical ofessions to bring these techniques and results to effective use.

the goals and preliminary results of this health initiative program re considered and found to show sufficient promise, NIAAA awarded 23 oject grants in FY 1973 in the amount of \$2,183,045 to be designated health initiative projects. These projects specifically focused on alth care services, new techniques for improving the productivity of r medical system and innovative projects in alcoholism research.

mer the guidelines of the health initiative program, grants were awarded, or instance, for the psychological and the medical treatment of alcoholic tients, for the assessment of drinking problems and practices of urban terican Indians, cross-cultural studies of problem drinking in Irish-tericans, the identification of employed alcoholic persons and their pervisor's attitude toward their drinking problems and for the drinking tiver problem. These projects have been underway for only one year and the projects are still in the data collection stage. Preliminary findings are presented at the NIAAA's Annual Conference.

though many of these projects are still in the data collection phase, me projects have already yielded enough information to suggest ways of proving the treatment of alcoholic patients. One project, for instance, alyzed alcoholism treatment programs in order to suggest ways in which ich programs can be extended or modified to maintain social functioning and briety for their alcoholic clients. The findings of this analysis have an published in book form. Its central message is that the establishment a treatment program is the rejection of the assumption that alcoholism solely a condition of the individual: that individuals can be cured of coholism. It states further that treatment can be an ongoing process and at creating a social landscape and at reconnecting alcoholic individuals the community concerned with their well-being. Alcoholic persons need to stablish relationships with people in a social network that is able to lintain the sobriety of its members.

another project, a new procedure was developed that rearranged community inforcements such as the job, family and social relations of the alcoholic reson to such an extent that he became cognizant that drinking was incompatible th other activities. For clients without families, synthetic families were

ged. Preliminary results showed that the group which did not have ocial environment changed to prevent drinking had 12 times as high employment record and spent five times as much time drinking. These is were more positive than originally predicted and future efforts be concentrated on improving the effectiveness of the procedures, to ase the cost, and to make them more generally usable.

er project provided some indication that treatment with lithium, a sance known to be useful in the treatment of depression, may have a dependent in reducing the number and severity of drinking episodes coholic patients. Research will continue to determine the long-benefits of this pharmacologic agent.

me demonstration area, a noteworthy three-year demonstration program, ently in its second year, was designed for initiating services for molic persons in a two-county rural or semi-rural area of northeastern sylvania through an outreach program that developed several pilot sylvania through persons in industry. The program, administered by rams for employed persons in industry. The program, administered by marywood College School of Social Work, Scranton, Pennsylvania, also evered to train 66 paraprofessional workers and 26 social work students the master's degree level with a concentration in alcoholism studies. The master's degree level with a concentration in alcoholism studies. The existing social service are objectives of the project included the development of a more rematized identification and referral process for the alcoholic person tematized identification and referral process for the existing social service was already being served in other parts of the existing social service ivery system and the establishment of specific graduate social work riculum to support field experiences in alcoholism.

the of the accomplishments to date include: development of a public formation and referral service for Luzerne and Wyoming counties (target as part of the outreach effort; development of an inter-agency ferral system in the demonstration area; establishment of a community ferral system in the demonstration area; establishment of a community ferral system in the demonstration area; expanded outpatient treatment services in the monstration area; expanded industrial outreach services, including constration to industrial firms; and recruitment, training and placement sultation to industrial firms; and recruitment, training and placement graduate social work school students in selected field agencies, sluding 10 second-year and 17 first-year students.

other health initiative program effort involved the U. S. Jaycees, the st civic all volunteer service organization concerned with alcohol use and alcoholism prevention. The first program year was essentially year of internal programming or program development during which gaining year of internal programming or program development during which gaining year and awareness among the membership was an objective. Neverderstanding and awareness among the membership was an objective. Neverdeless, though beginning late in the Jaycee program year, the project corded these accomplishments:

- Adopted alcohol abuse and alcoholism prevention as a major emphasis program which assured commitment by the Jaycees.

- -- Enacted only two resolutions in 1972, both passed unanimously and concerned with (1) responsible drinking, and (2) the Uniform Alcoholism and Intoxication Treatment Act drafted by the National Conference of Commissioners of Uniform State Laws.
- -- Implemented program techniques similar to those used successfully in the multiple sclerosis and mental health areas at all levels, such as the development of working relationships with community resources, State alcoholism authorities, local councils and agencies, labor and management, and State and national leadership.
- -- Made seed grants for special projects covering a range of activities to more than 150 communities in which Jaycees are participating. These projects focused on utilization of hospitals, seminars for correctional officers, youth seminars, and area-coordinating councils. Each of these projects, like the overall project, has had a multiplier and catalytic effect. These projects are in the period of evaluation.
- -- Made contacts and relationships with the corporate leadership of the Fortune 500 list, Governors of the States and other groups and individuals concerning the Jaycee program.
- Developed program kits for implementation and promotion of the program.

ALCOHOL AND HEALTH REPORT

first Special Report to the U.S. Congress on Alcohol and Health the Secretary of Health, Education, and Welfare, dated December 1971, arized a substantial portion of the current scientific knowledge on health consequences of using alcoholic beverages and represented the part of a three-year comprehensive study by the NIAAA to help the ion combat alcohol-related problems.

the second phase of this three-year study, NIAAA worked to design and methodologies for assessing more precisely and more completely the alcohol affects selected areas of well-being, as well as identifying most feasible methods for implementing effective prevention and treat-through the programs. Where appropriate, the Institute awarded a number of lied research contracts and grants to further clarify the findings of first special report.

projects underway can be grouped into the following eight overlapping regories:

- 1. Developmental aspects
- 2. Special populations
- 3. Alcohol and aggression
- 4. Alcohol and disease
- 5. Physiological aspects
- 6. Prevention and education
- 7. Treatment
- 8. Rehabilitation

the past, biomedical research has received the highest priority in the all of alcohol abuse and alcoholism. As can be seen from the major tegories listed here, the NIAAA has been seeking to increase support of all-designed studies in the applied research area, thereby creating a term balanced research program.

number of the projects being supported relate directly to prevention a education, the effective utilization of various treatment modalities and psychological determinants of alcohol abuse and alcoholism. The sultant findings will be made available to both Congress and the people the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary's second special report on alcohol the United States in the Secretary second special report on the Secretary second special report of the Secretary second special report on the Secretary second special repo

HEALTH INSURANCE COVERAGE FOR ALCOHOLISM

Health insurance mechanisms for conditions such as alcoholism have not developed as quickly nor fared as well as those mechanisms for purely physical conditions. In the past, coverage for the treatment of alcoholism has generally been excluded from health insurance. In a recent examination by NLAAA, the alcoholism coverage provided by various forms of health insurance in the United States revealed a spectrum of widely differing policy benefits, with alcoholism frequently excluded.

MIAAA believes that coverage for alcoholism and related health problems should be an accepted and routine feature of physical and/or mental conditions that health care facilities are expected to treat. Health insurance carriers should cover alcoholism as they already cover various aspects of care related to illnesses such as heart disease, cancer, diabetes, etc.

NIAAA and the National Council on Alcoholism initiated in FY 1973 the development of a proposed benefit package designed to act as a guideline to carriers providing alcoholism coverage in health insurance plans. This proposed benefit package will be made available to all State alcohol authorities, employers, trade unions, and the insurance industry. Technical assistance will be provided to NCA by NIAAA staff, who will assist interested parties in modifying or redefining this package to suit their specific requirements.

As a result of further joint NIAAA/NCA efforts initiated during the Fiscal Year, extensive data on the costs of treating and caring for alcoholic persons should soon become available. Costs have been frequently used as an argument against insurance coverage by both carriers and purchasers, despite the fact that treatment costs were not well known. The data currently being collected should ultimately provide valuable information to health insurance purchasers, labor unions, and insurance carriers, and should facilitate the design as well as the negotiation of alcoholism policy provisions.

Standards for facilities, staff, performance criteria, and costs for providing alcoholism treatment are poorly defined. In an effort to resolve this problem, NIAAA entered into a contract with the Joint Commission on Accreditation of Hospitals to provide expertise and technical assistance in the development of standards in these various areas. This contract has a starting date of July 1973.

At the end of FY 1972, the Institute defined and scheduled a two-year objective containing elements relating to standard-setting activities and other activities that bear on the eventual participation of the private group health insurance industry in the provision of benefits for the total spectrum

ervices appropriate to the treatment of alcoholism. This work began ng FY 1973 and will be instrumental in clarifying many of the issues lived and will be of help in reducing current health insurance exclusions limitations related to alcoholism.

INTERNATIONAL ACTIVITIES

A recent Conference held by the United Nations Educational, Scientific, and Cultural Organization in Paris concluded that alcohol remains the number one drug problem in both developed and developing nations. Alcohol constitutes by far the most serious and devastating drug problem in terms of the number of people it destroys, the number of families it shatters, and the enormous economic toll it exacts.

International cooperation offers the invaluable opportunity of utilizing a variety of resources toward discussing common concerns and possible plans for alcoholism treatment and research. Through a network of cutual cooperation, NIAAA has pursued solutions to common problems by sharing available resources and learning from the experience of other countries.

puring FY 1973, the Institute funded \$132,000 for studies to stimulate and support multinational cooperation in undertaking basic and applied research concerning the causes of alcohol abuse and alcoholism and the most effective methods of combatting them. These range from crosscultural studies of drinking practices and epidemiological investigations to evaluations of the effectiveness of different treatment modalities and different delivery systems for combatting alcoholism.

EPIDEMIOLOGY OF ALCOHOLISM IN LATIN AMERICA (LATIN AMERICA)

Alcoholism, a disease shared by every country in the Western Hemisphere, is particularly devastating in Central and South America. A project has been undertaken by the Pan American Health Organization with three general objectives:

- -- Research on drinking attitudes and patterns in several Latin American cultures.
- -- Prevention of alcohol-related traffic accidents.
- Development of centers for the study of alcoholism in Latin America and of treatment demonstration units in several cities.

In connection with the first objective, information was obtained on type and amount of beverage consumed, place and time of drinking, family structure, work situation, diet, geographic isolation, migration patterns, and other relevant factors. Data were collected through home surveys, interviews, and questionnaires from both drinkers and hondrinkers in both urban and rural populations.

accomplish the second objective, advisory services were developed r controlling alcohol-related traffic accidents in the countries neerned. Periodic international seminars are held with the particination of administrators, educators, traffic officials, and others, discuss problems of common interest and to exchange information on embedding most recent advances; to outline policies and propose programs; do not promote field research in places where the problems are evident, arough small grants to specialized centers. Three such multidisciplinary minars, one in Middle America, one in South America, and one in the aribbean area, were held in FY 1973 on problems of alcoholism and raffic accidents.

oncerning the third objective, a Center for the Study of Alcohol and Icoholism was established in Costa Rica through a grant to the Pan nerican Health Organization in the amount of \$216,000. Another Center ill be set up next year at a South American location. The Centers rovide consultation in alcoholism and relevant disorders and award research fellowships. The Costa Rican Center has already conducted a esearch fellowships. The Costa Rican Center has already conducted a hree-week program to train key persons from the Latin American nations, hree-week program to train key persons from the Latin American nations, hree-week program to train key persons from the Latin American nations, hree-week program to train key persons from the Latin American nations, hree-week program to train key persons from the Latin American nations, hree-week program to train key persons from the Latin American nations, hree-week program to train key persons from the Latin American nations. Field visits were made to a number of location, including its causes, medical complications, epidemiology, reatment, and rehabilitation. Field visits were made to a number of reatment facilities and other relevant installations. Trainees, including social workers, physicians, and psychiatric personnel, are including social workers, physicians, and psychiatric personnel, are including and developing alcoholism programs.

THE ROLE OF ALCOHOLIC BEVERAGES IN THE ETIOLOGY OF CERTAIN CANCERS IN TAX (FRANCE)

During the last three decades, considerable data have indicated that, in Western industrialized States, an association may exist between heavy alcohol ingestion and certain types of cancer, specifically cancer of the esophagus and of the liver. In an effort to accelerate the development of scientific findings in this area, the Institute awarded a three-part research contract to the International Agency for Research on Cancer, Lyon, France, in the amount of \$48,000.

In the first phase of the study, data were analyzed from a number of cancer registers in different countries in order to relate overall alcohol consumption to the incidence of cancer at different sites. Where possible, temporal changes in cancer incidence and alcohol consumption were also determined.

In the second phase, data available from case control studies in Jamaica, Thailand, Singapore, and France were used to study the effects of alcoholic Eeverages through a range of personal and dietary backgrounds. In each

rion, questions were posed both to patients with cancer of the esophagus of to control subjects, on the use and nature of alcoholic bewerages as all as smoking, dietary, and other habits and exposures.

the third part of the study, individuals who showed evidence of alcoholism re identified from hospitalization and arrest records, and other sources, determine the proportion included in cancer registries in Norway, Sweden, inland, and certain areas of the United Kingdom. Specific factors considered aclude:

- The incidence of esophageal and liver cancers in the general population and in alcoholic persons.
- -- Regional differences among and within countries.

REDITY AND ENVIRONMENT IN THE DEVELOPMENT OF ALCOHOLISM (DENMARK)

number of studies have shown that alcoholism is a familial disorder. A blaborative adoption study undertaken in Denmark by Donald W. Goodwin, D., and his colleagues, Washington University, St. Louis, Missouri, seeks determine whether men raised apart from their biological parents were re likely to have drinking problems or other psychiatric difficulties if the of their biological parents was an alcoholic person than if no alcoholism is recorded among their biological parents. The results of psychiatric terviews showed that the incidence of alcohol problems — social, legal, cational, and medical — was generally higher in the proband group than the control group (p <.02). The two groups did not differ with regard other forms of psychopathology, such as depression or character disorders. All the control group. These findings suggested that genetic factors by play a role in the development of alcohol problems and that the presposition to alcoholism is relatively specific, at least in men.

COHOL AND ALDEHYDE METABOLIZING DEHYDROGENASES (SWITZERLAND)

recent years, research on biochemical aspects of alcoholism has concented increasingly on determining the action of ethanol on the central rooms system, particularly at the molecular level.

udies by Dr. Jean P. von Wartburg, Professor of Biochemistry, University Berne, Switzerland, of the enzymes involved in the metabolism of hanol and biogenic amines are representative of investigations currently derway in this area. Dr. von Wartburg's research efforts consisted of 'ee separate, although related, studies.

st, he is investigating the effect of certain drugs on purified samples the enzyme, liver alcohol dehydrogenase. Second, studies of aldehyde varogenase and aldehyde reductase are underway with the aim of determining

* ability of these enzymes to convert various biogenic aldehydes to calculate and biogenic alcohols, respectively. Finally, Dr. von Wartburg investigating the possibility that various cell types contain dehydrogenases reductases of differing specificities toward ethanol and the biogenic lenydes.

EVERTION OF ADVERSE METABOLIC EFFECTS OF ALCOHOL (SWEDEN)

cohol dehydrogenase is the major enzyme responsible for the metabolism cthanol. A Nobel Laureste, Dr. Hugo T. Theorell, Professor of Biochemistry, clinaka Institutet, Stockholm, Sweden, has been conducting a broad range studies aimed at understanding how alcohol dehydrogenase works at the lecular level. Three major areas were investigated:

- -- Studies on enzyme structure.
- Studies on the structure and interaction of inhibitors with the active site of ADE.
- Metabolic studies.

ver tissue from humans and rats are being used in these studies.

MANOL - INDUCED CHANGES IN BRAIN MITOCHONDRIA (CANADA)

e objective of this project, undertaken in Canada, was to determine the chanism of ethanol depression and ethanol withdrawal hyperactivity of the atral nervous system. Mitochondria and synaptosomes have been isolated on the brains of rats treated acutely with ethanol, phenobarbital or phine. Chronic studies with these drugs have been carried out, including plation of brain organelles during withdrawal.

AIN STIMULATION AND ALCOHOL PREFERENCE (CANADA)

lot studies with rats have indicated electrical stimulation in the lateral pothalamic area is followed by permanent preference for strong alcohol lutions rather than water. It is now planned in Canada to evaluate:

- The effect of stimulation of brain sites that have functional characteristics in common with the lateral hypothalamus.
- The effects of hypothalamic stimulation in rats that have lesions in other areas of the brain.