MANAGEMENT INFORMATION SYSTEMS

Department Goal:

The goal of the 1991-1996 CIP for the Management Information Systems Department is to continue to provide cost effective quality computer processing and telecommunications services to the Municipality while at the same time reducing costs by the consolidation of application systems onto a single mainframe computer.

Program Statement:

This goal can be accomplished through the upgrade of the IBM mainframe, migration from the Data General systems and the procurement and implementation of various new software packages. All project costs (totaling $2,672,000 for 1991 and $4,477,000 for 1991-1996) will be funded via a commercial loan to Management Information Systems, which will be repaid through realized savings and allocations to other departments.

YEAR	TITLE	CATEGORY	DEPT PRTY	TOTAL FUNDING REQUEST
1991	PL/I COMPILER AND LIBRARY	CU	1	45
1991	INSTALL VSAM RECOVERY SOFTWARE	CU	2	32
1991	TERMINAL UPGRADES	CU	3	219
1991	VS COBOL II COMPILER AND LIBRARY	CU	4	78
1991	INSTALL OFFICEVISION	CU	5	122
1991	INSTALL "C" COMPILER	CU	6	45
1991	SCHEDULING SOFTWARE	CU	7	87
1991	NETWORK UPGRADES	CU	8	380
1991	MAINFRAME UPGRADES	CU	9	988
1991	PRINTER UPGRADES	CU	10	201
1991	CICS/ESA SOFTWARE	CU	11	220
1991	INFORMATION CENTER UPGRADES	CU	12	40
1991	PROGRAMMER WORK STATIONS	CU	13	80
1991	EASYPROCLIB	CU	14	15
1991	IMPROVED DATA RECORDING CAPABILITY (IDRC)	CU	15	50
1991	OFFICEVISION OS/2 LAN	CU	16	20
1991	OPERATIONAL INTERFACES	CU	17	50
				2,672
1992	CULLINET ENTERPRISE DEC-VAX PRODUCTS	CU	1	180
1992	DCRIS PHASE I REPLACEMENT	CU	2	400
1992	INFORMATION CENTER UPGRADES	CU	3	15
1992	PROGRAMMER WORK STATIONS	CU	4	70
				665
1993	DATA BASE ENVIRONMENT STUDY	CU	1	75
1993	ATU BILLING SYSTEM	CU	2	400
1993	INFORMATION CENTER UPGRADES	CU	3	15
1993	PROGRAMMER WORK STATIONS	CU	4	70
				560
1994	NEW DATA BASE SYSTEM	CU	1	360
1994	OPERATIONAL INTERFACES	CU	2	50
1994	INFORMATION CENTER UPGRADES	CU	3	15
1994	PROGRAMMER WORK STATIONS	CU	4	70
				495
1995	INFORMATION CENTER UPGRADES	CU	1	15
1995	PROGRAMMER WORK STATIONS	CU	2	70
				85

END OF REPORT

CATEGORY KEY: CU = Computer Upgrades/Purchases

Assembly Revision 12/18/90

Department Management Information Srvcs	1991 PROJECT COST (000's)	Program Computer Upgrades/Purchases	
PROJECT TITLE AND DESCRIPTION	S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank	O&M COST (000's)	COMMUNITY COUNCIL - PRIORITY
		DEBT SERVICE (000's)	1-Essential 2-Necessary 3-Desireable
PL/I COMPILER AND LIBRARY Install new version of PL/I compiler to take advantage of new ESA software/hardware. Increase programmers productivity with new Language features and on-line debug.	O= 45	2.0 0.0	Areawide (All)
INSTALL VSAM RECOVERY SOFTWARE Provide ability to recover data from VSAM files and system catalogs. In particular, provide ability to recover OFFICE SUPPORT and Application System (A/S) files in case of system failure.	O= 32	3.0 0.0	Areawide (All)
TERMINAL UPGRADES Replace antiquated/obsolete terminals with full-function terminals. Enable MIS to meet user demands for color/graphics terminals. Enable effective use of new MIS tools such as A/S project management.	O= 219	12.0 0.0	Areawide (All)
			1991

Adopted by the Assembly 12/18/90

MUNICIPALITY OF ANCHORAGE
1991 CAPITAL IMPROVEMENT BUDGET

Department Management Information Srvcs	1991 PROJECT COST (000's)		Program Computer Upgrades/Purchases	
PROJECT TITLE AND DESCRIPTION	S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank		O&M COST (000's)	COMMUNITY COUNCIL - PRIORITY
			DEBT SERVICE (000's)	1-Essential 2-Necessary 3-Desirable
VS COBOL II COMPILER AND LIBRARY Install new version of COBOL. This will im- prove programmer productivity by simplifying CICS and IDMS coding, providing on-line debugging and many programming enhancements. Take advantage of new software and hardware, interface with new OfficeVision software. This will also bring compiler up to current IBM SAA and ANSI COBOL standards.	O=	78	3.0 0.0	Areawide (All)
INSTALL OFFICEVISION New integrated SAA version of the OFFICE SUPPORT software. The user interface is greatly improved over current software and is consistent across all IBM platforms. Will eliminate requirements for multiple user id's for PC users. Allows windowing into other mainframe applications while working in OfficeVision.	O=	122	12.0 0.0	Areawide (All)
				1991

Adopted by the Assembly 12/18/90

MUNICIPALITY OF ANCHORAGE
1991 CAPITAL IMPROVEMENT BUDGET

Department Management Information Srvcs	1991 PROJECT COST (000's)	Program Computer Upgrades/Purchases	
PROJECT TITLE AND DESCRIPTION	S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank	O&M COST (000's)	COMMUNITY COUNCIL - PRIORITY
		DEBT SERVICE (000's)	1-Essential 2-Necessary 3-Desireable
INSTALL "C" COMPILER Install "C" compiler for systems software programming. Improve productivity of systems programming staff and reduce learning curve time for newer staff by eliminating need to learn the esoteric assembler language. "C" provides a highlevel language for systems work similar to COBOL or PLI, but usable for all systems code including internal systems exits, etc.	O= 45	2.0 0.0	Areawide (All)
SCHEDULING SOFTWARE Acquire/install automated computer operations scheduling software to increase level of automation in data center operations, de-creasemanual intervention required, improve reliability of batch processing, and provide workload forecasts and current schedule reports.	O= 87	5.0 0.0	Areawide (All)
			1991

Adopted by the Assembly 12/18/90

MUNICIPALITY OF ANCHORAGE
1991 CAPITAL IMPROVEMENT BUDGET

Department Management Information Srvcs	1991 PROJECT COST (000's)	Program Computer Upgrades/Purchases		
PROJECT TITLE AND DESCRIPTION	S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank	O&M COST (000's) DEBT SERVICE (000's)	COMMUNITY COUNCIL - PRIORITY 1-Essential 2-Necessary 3-Desireable	
NETWORK UPGRADES Replace network terminal control units with new technology units. Enable integration of multiple networks into unified network with central control and monitoring. Enable attachment of ASCII terminals to IBM network. Enable attachment of advanced function terminals into network. Provide diagnostic and microcode loading from central location.	O= 380	20.0 0.0	Areawide (All) .	
MAINFRAME UPGRADES Upgrade mainframe computer from 3090/170S to model 180J to accommodate increased application workload due to migration from other processors. (This project may enable ATU to eliminate as many as 40 positions, which would drastically reduce operating costs.)	O= 988	55.0 0.0	Areawide (All) .	
PRINTER UPGRADES Replace antiquated printers on network with graphics-capable printers. Reduce maintenance, simplify network control, and expand functions available to users.	O= 201	10.0 0.0	Areawide (All)	
			1991	

MUNICIPALITY OF ANCHORAGE
1991 CAPITAL IMPROVEMENT BUDGET

Department Management Information Srvcs	1991 PROJECT COST (000's)	Program Computer Upgrades/Purchases	
PROJECT TITLE AND DESCRIPTION	S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank	O&M COST (000's) DEBT SERVICE (000's)	COMMUNITY COUNCIL - PRIORITY 1-Essential 2-Necessary 3-Desireable
CICS/ESA SOFTWARE Install CICS/ESA Version 3. Enhances CICS capabilities by removing limits on growth of users, terminals, and applications. Provides improved response time by utilizing features of new system software and upgraded processor storage. Increased application, security and systems capabilities.	O= 220	12.0 0.0	Areawide (All)
INFORMATION CENTER UPGRADES Improve the quality and scope of services available from our Information Center by acquisition of microcomputer equipment and processing capability so as to maintain com- patibility with systems already installed in the client community for which we have train- ing, troubleshooting and maintenance respon- sibility.	O= 40	2.0 0.0	Areawide (All)
PROGRAMMER WORK STATIONS Provide personal computers, printers and related software for Application Services Staff.	O= 80	4.0 0.0	Areawide (All)
			1991

Department Management Information Srvcs	1991 PROJECT COST (000's)		Program Computer Upgrades/Purchases	
PROJECT TITLE AND DESCRIPTION	S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank		O&M COST (000's)	COMMUNITY COUNCIL - PRIORITY
			DEBT SERVICE (000's)	1-Essential 2-Necessary 3-Desireable
EASYPROCLIB EasyProclib is an MVS operating system enhancement that allows computer system users to execute JCL statements from their own private procedure libraries, independent of those provided by the system. This would primarily benefit the MIS staff by making testing and development easier. It would also eliminate a system exposure that occurs when a procedure library is unavailable.	O=	15	1.0 0.0	Areawide (All)
IMPROVED DATA RECORDING CAPABILITY (IDRC) IDRC will allow increased performance and capacity of cartridge tape drives. Benefits include reduced run-time for tape intensive jobs, and reduced tape costs, because each tape can hold up to 5 times the data. Also reduces processor utilization because data compression can be done by the tape subsystem, rather than the host.	O=	50	5.0 0.0	Areawide (All)
				1991

MUNICIPALITY OF ANCHORAGE
1991 CAPITAL IMPROVEMENT BUDGET

Department Management Information Srvcs	1991 PROJECT COST (000's) S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank	Program Computer Upgrades/Purchases	
PROJECT TITLE AND DESCRIPTION		O&M COST (000's) DEBT SERVICE (000's)	COMMUNITY COUNCIL - PRIORITY 1-Essential 2-Necessary 3-Desireable
OFFICEVISION OS/2 LAN Install an OS/2 based LAN in order to facil- itate the installation and maintenance of OS/2 based distributed applications such as OfficeVision.	O= 20	2.0 0.0	Areawide (All)
OPERATIONAL INTERFACES Interactive interfaces between central office switches, 611 (LRS 10), four wire test (RATS) and the DCRIS software systems (Hardware only - this project may allow for the elimination of certain ATU positions, resulting in a de- crease in operating costs.)	O= 50		Areawide (All)
			1991

MUNICIPALITY OF ANCHORAGE
1991 CAPITAL IMPROVEMENT BUDGET

Department Management Information Srvcs	1991 PROJECT COST (000's)	Program Computer Upgrades/Purchases	
PROJECT TITLE AND DESCRIPTION	S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank	**O&M COST** (000's) **DEBT SERVICE** (000's)	**COMMUNITY COUNCIL - PRIORITY** 1-Essential 2-Necessary 3-Desireable
Sub-Total(s)	O= 2,672		
Program Total	2,672	150.0 0.0	
××	××××××××××	××××××××	×××××××××××××××××××××××××××××××××××××××
Sub-Total(s)	O= 2,672		
Total for Management Information Srvcs	2,672	150.0 0.0	
			1991

MUNICIPALITY OF ANCHORAGE
1991 - 1996 CAPITAL IMPROVEMENT PROGRAM

Department	Program					
Management Information Srvcs	Computer Upgrades/Purchases					

PROJECT TITLE AND DESCRIPTION	(000's) S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank					
	1991	1992	1993	1994	1995	1996
PL/I COMPILER AND LIBRARY Install new version of PL/I compiler to take advantage of new ESA software/hardware. Increase programmers productivity with new Language features and on-line debug.	O= 45					
INSTALL VSAM RECOVERY SOFTWARE Provide ability to recover data from VSAM files and system catalogs. In particular, provide ability to recover OFFICE SUPPORT and Application System (A/S) files in case of system failure.	O= 32					
TERMINAL UPGRADES Replace antiquated/obsolete terminals with full-function terminals. Enable MIS to meet user demands for color/graphics terminals. Enable effective use of new MIS tools such as A/S project management.	O= 219					
					1991 - 1996	

Adopted by the Assembly 12/18/90

MUNICIPALITY OF ANCHORAGE
1991 - 1996 CAPITAL IMPROVEMENT PROGRAM

Department	Program
Management Information Srvcs	Computer Upgrades/Purchases

PROJECT TITLE AND DESCRIPTION	(000's) S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank					
	1991	1992	1993	1994	1995	1996
VS COBOL II COMPILER AND LIBRARY Install new version of COBOL. This will im- prove programmer productivity by simplifying CICS and IDMS coding, providing on-line debugging and many programming enhancements. Take advantage of new software and hardware, interface with new OfficeVision software. This will also bring compiler up to current IBM SAA and ANSI COBOL standards.	O= 78					
INSTALL OFFICEVISION New integrated SAA version of the OFFICE SUPPORT software. The user interface is greatly improved over current software and is consistent across all IBM platforms. Will eliminate requirements for multiple user id's for PC users. Allows windowing into other mainframe applications while working in OfficeVision.	O= 122					
					1991 - 1996	

Department	Program
Management Information Srvcs	Computer Upgrades/Purchases

PROJECT TITLE AND DESCRIPTION	(000's) S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank					
	1991	1992	1993	1994	1995	1996
INSTALL "C" COMPILER Install "C" compiler for systems software programming. Improve productivity of systems programming staff and reduce learning curve time for newer staff by eliminating need to learn the esoteric assembler language. "C" provides a highlevel language for systems work similar to COBOL or PLI, but usable for all systems code including internal systems exits, etc.	O= 45					
SCHEDULING SOFTWARE Acquire/install automated computer operations scheduling software to increase level of automation in data center operations, de-creasemanual intervention required, improve reliability of batch processing, and provide workload forecasts and current schedule reports.	O= 87					
					1991 - 1996	

Adopted by the Assembly 12/18/90

Department Management Information Srvcs	Program Computer Upgrades/Purchases					
PROJECT TITLE AND DESCRIPTION	(000's) S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank					
	1991	1992	1993	1994	1995	1996
NETWORK UPGRADES Replace network terminal control units with new technology units. Enable integration of multiple networks into unified network with central control and monitoring. Enable attachment of ASCII terminals to IBM network. Enable attachment of advanced function terminals into network. Provide diagnostic and microcode loading from central location.	O= 380					
MAINFRAME UPGRADES Upgrade mainframe computer from 3090/170S to model 180J to accommodate increased application workload due to migration from other processors. (This project may enable ATU to eliminate as many as 40 positions, which would drastically reduce operating costs.)	O= 988					
PRINTER UPGRADES Replace antiquated printers on network with graphics-capable printers. Reduce maintenance, simplify network control, and expand functions available to users.	O= 201					
				1991 - 1996		

MUNICIPALITY OF ANCHORAGE
1991 - 1996 CAPITAL IMPROVEMENT PROGRAM

Department Management Information Srvcs	Program Computer Upgrades/Purchases					
PROJECT TITLE AND DESCRIPTION	(000's) S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank					
	1991	1992	1993	1994	1995	1996
CICS/ESA SOFTWARE Install CICS/ESA Version 3. Enhances CICS capabilities by removing limits on growth of users, terminals, and applications. Provides improved response time by utilizing features of new system software and upgraded processor storage. Increased application, security and systems capabilities.	O= 220					
INFORMATION CENTER UPGRADES Improve the quality and scope of services available from our Information Center by acquisition of microcomputer equipment and processing capability so as to maintain compatibility with systems already installed in the client community for which we have training, troubleshooting and maintenance responsibility.	O= 40	O= 15	O= 15	O= 15	O= 15	
PROGRAMMER WORK STATIONS Provide personal computers, printers and related software for Application Services Staff.	O= 80	O= 70	O= 70	O= 70	O= 70	
				1991 - 1996		

Adopted by the Assembly 12/18/90

MUNICIPALITY OF ANCHORAGE
1991 - 1996 CAPITAL IMPROVEMENT PROGRAM

Department	Program
Management Information Srvcs	Computer Upgrades/Purchases

PROJECT TITLE AND DESCRIPTION	(000's) S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank					
	1991	1992	1993	1994	1995	1996
EASYPROCLIB EasyProclib is an MVS operating system enhancement that allows computer system users to execute JCL statements from their own private procedure libraries, independent of those provided by the system. This would primarily benefit the MIS staff by making testing and development easier. It would also eliminate a system exposure that occurs when a procedure library is unavailable.	O= 15					
IMPROVED DATA RECORDING CAPABILITY (IDRC) IDRC will allow increased performance and capacity of cartridge tape drives. Benefits include reduced run-time for tape intensive jobs, and reduced tape costs, because each tape can hold up to 5 times the data. Also reduces processor utilization because data compression can be done by the tape subsystem, rather than the host.	O= 50					
					1991 - 1996	

Department	Program
Management Information Srvcs	Computer Upgrades/Purchases

PROJECT TITLE AND DESCRIPTION	(000's) S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank					
	1991	1992	1993	1994	1995	1996
OFFICEVISION OS/2 LAN Install an OS/2 based LAN in order to facilitate the installation and maintenance of OS/2 based distributed applications such as OfficeVision.	O= 20					
OPERATIONAL INTERFACES Interactive interfaces between central office switches, 611 (LRS 10), four wire test (RATS) and the DCRIS software systems (Hardware only - this project may allow for the elimination of certain ATU positions, resulting in a decrease in operating costs.)	O= 50					
CULLINET ENTERPRISE DEC-VAX PRODUCTS Software engineering tool for implementing production applications for the DEC-VAX environment.		O= 180				
DCRIS PHASE I REPLACEMENT Acquisition of new system to replace DCRIS Phase I (Hardware only).		O= 400				
					1991 - 1996	

Department Management Information Srvcs	Program Computer Upgrades/Purchases					
PROJECT TITLE AND DESCRIPTION	(000's) S-State B-Bond A-Assmt D-D.O.T. F-Federal O-Other H-Heritage Land Bank					
	1991	1992	1993	1994	1995	1996
DATA BASE ENVIRONMENT STUDY Study, evaluate and recommend future DBMS environment.			O= 75			
ATU BILLING SYSTEM Replacement of ATU customer billing system (Hardware only).			O= 400			
NEW DATA BASE SYSTEM Purchase and install or upgrade to new technology.				O= 360		
OPERATIONAL INTERFACES Enhance interfaces between administrative systems (billing and DCRIS Phase I) with operational systems (CRS10, DMS100, GIS) (Hardware only - this project may enable ATU to eliminate certain positions, resulting in a reduction of operating costs.)				O= 50		
				1991 - 1996		

Department	Program					
Management Information Srvcs	Computer Upgrades/Purchases					

PROJECT TITLE AND DESCRIPTION	(000's) S-State B-Bond A-Asamt D-D.O.T. F-Federal O-Other H-Heritage Land Bank					
	1991	1992	1993	1994	1995	1996
Sub-Total(s)	O= 2,672	O= 665	O= 560	O= 495	O= 85	
Program Total	2,672	665	560	495	85	0
***	*********	*********	*********	*********	*********	*********
Sub-Total(s)	O= 2,672	O= 665	O= 560	O= 495	O= 85	
Total for Management Information Srvcs	2,672	665	560	495	85	0

1991 - 1996