

ACCOUNTING INFORMATION SYSTEM

BY

IDREES AHMED KHAN

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F I N A L A P P R O V A L

This is to certify that we have read the Thesis submitted by Mr. IDREES AHMED KHAN and it is our judgement that this Thesis is of sufficient standard to warrant its acceptance by the Quaid-i-Azam University, Islamabad, for the degree of Master of Science in Computer Sciences.

COMMITTEE

1. EXTERNAL



2. SUPERVISOR



Mr. NAEEM AKHTAR BHATTI
DEPTT. OF COMPU. TER SCIENCES
QUAID-I-AZAM UNIVERSITY
ISLAMABAD.

3. CHAIRMAN



DR. MASUD AHMED MALIK
DEPTT. OF COMPUTER SCIENCES
QUAID-I-AZAM UNIVERSITY
ISLAMABAD.

P R O J E C T B R I E F

PROJECT NAME: Accounting Information System.
ORGANIZATION: Allied Bank Limited ,Pakistan.
DATE OF STARTING: September, 1987.
DATE OF COMPLETION: December, 1987.
SYSTEM USED: NEC/P.C, TANDY 1200.
SOURCE LANGUAGE: RM COBOL.

Dedicated
to my brothers
Sarfraz A.Khan,
Waqar A.Khan

A B S T R A C T

This study has been conducted to design a computerised system which contains important informations about all the persons who retain an account in Allied Bank Limited, Rawalpindi Zone. This system will facilitate short time retrieval of information as required by the user.

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A C K N O W L E D G E M E N T

My work owes much to the criticism and suggestions of my supervisor and my colleagues. I am grateful and indebted to all the persons who help me make this work possible. I extend my thanks to all of them.

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Mr. Usman was involved during problem definition and system study, I am thankful for his kind cooperation.

Lastly, I would like to thank the Circle Executive, ABL, Rawalpindi Circle who assigned me this software development project.

P R E F A C E

Twentieth century has witnessed a revolution in the field of information. It is rightly called the century of informations. The volume of information is exploding, and to keep pace with new discoveries these informations should be handled tactically. Achievable plans and effective decisions can only be made if adequate, timely and accurate informations are available. This makes the information management a prerequisite for success of any organization. Computer has delegated swiftness, accuracy and versatility to information processing. Now most of the organizations are referring to computer for sharing the benefits of computer aided information processing.)

The following study is about the development of computerised accounting information system for ABL. The manuscript is divided into six different chapters and a cursory view of these chapters is discussed below. The first chapter gives a concise introduction of organization along with the description of problem and formation of objectives within given resources.

Next chapter discusses at length the present system in reference to accounting informations. General terms used for accounting are described precisely. Then present system is discussed in detail alongwith identification of its limitations.

Third chapter, proposed system, considers the

system, its objectives, and input resources. The suggestions for improvement of existing system are made in it. The outputs of the system are discussed in detail.

In fourth chapter is described the general descriptions of components and their relationship with each other.

Fifth chapter is about the software developed. For whole of the software different topics like input descriptions and output descriptions are discussed in detail to avoid any kind of complexity that may arise at any stage.

The sixth and final chapter the implementation deliberations. The risks involved, the resources involved and feasible conversion strategies are discussed in length. Finally a conversion plan is proposed.

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CHAPTER ONE

INTRODUCTION

INTRODUCTION

1.1 INTRODUCTION TO ORGANIZATION

Allied Bank Limited of Pakistan with its head office in Karachi came into existence before 1947. This bank handles the accounting system of individual as well as corporate bodies. The overall system of Allied Bank Limited (ABL) of Pakistan is controlled by eight Circle Offices throughout the country.

In the previous few, years ABL has considerably progressed in all spheres. This is because of the policy of bank on the intense training of staff. Secondly the computerization and automation helps in elimination of manual forestallments. With its unique set up, it is hoped that ABL will overcome all over the country and would share a considerable resource of income in the development of the country.

The bank is headed by the President with the Members of the Board of ABL, Circle Executives, Zonal Heads, Managers and Officers. Therefore, project to computerize the accounting system of Zonal Office, Rawalpindi was assigned to me. The Rawalpindi Zonal Office is retaining a total staff of 325 people. This branch is handling the accounting system for Rawalpindi Zone with a need for this work to be computerized.

1.2 INTRODUCTION TO STUDY

ABL, one of biggest organization, is operating in all parts of the country with a gigantic accounting system. It has corollary enhanced the information of management. As far as the working decisions are concerned, the management needs

accounting informations because the informations available are highly insufficient. To solve this problem a study was conducted which is discussed below.

✓1.2.1 PROBLEM DEFINITION

There is no extensive system for accounting informations. So it impedes the management in making decisions as follows:

- _ There is no mechanism to study the accounting system
- _ Manual handling makes these informations erroneous

✓1.2.2 SYSTEM OBJECTIVES

After analysing the problem and reviewing the informations that have so far been collected, the following objectives of the system have agreed upon:

- _ A computerized accounting system should be designed
- _ The proposed system should be without the interventions of manual system

However, the accounting system of general banking is a very large project, the phase of account handling was assigned to me. The account handling includes:

- _ Account opening of PLS, Current and Term Deposit accounts
- _ Updation (transactions) of these accounts
- _ Closing of these accounts
- _ Daily cash of bank

1.2.2.1 ACCOUNT OPENING

The account opening includes the records of clients who open any type of above three mentioned accounts.

1.2.2.2 ACCOUNT UPDATE

The updation includes the daily transactions of depositing and drawing the cash.

1.2.2.3 ACCOUNT CLOSING

The closing is the drawing back all the cash by an account holder.

1.2.2.4 DAILY CASH CLOSING

The cash closing includes the total debits and credits for the bank in a single day.

1.3 SYSTEM CONSTRAINTS

The settlement of system constraints is of paramount importance for successful system design. The following constraints were finalized to design the accounting information system.

- _ The work should be done on Personal Computer.
- _ The Software should be developed in COBOL
- _ The system should be developed without the inconvenience of large changes in existing system.

CHAPTER TWO

EXISTING SYSTEM

EXISTING SYSTEM

2.1 INTRODUCTION

Allied Bank Limited of Pakistan is one of the largest accounts related organization. Under the present setup it is extending accounts activities throughout the country. The accounts are extending to both individuals and corporate bodies under well organized procedures and schemes. There are three major types of accounts discussed as follows:

- _ PROFIT AND LOSS SHARING ACCOUNT (PLS ACCOUNT)
- _ CURRENT ACCOUNT
- _ TERM DEPOSIT ACCOUNT

2.2 PLS ACCOUNT

This account is further divided into two categories given as:

- _ PLS INDIVIDUAL ACCOUNT
- _ PLS JOINT ACCOUNT

2.2.1 PLS INDIVIDUAL ACCOUNT

This account is opened by a single person. No more than one person can share an individual account. This account can not be opened by the names of corporations, enterprises, limited, etc.

It is a profit/loss bearing account. The profit/loss of the account holder is dependent on the profit/loss of the bank calculated after a specific period of time. If the bank goes into loss, the account holder would have to bear a loss in his/her amount. The profit amount of bank shows a profit amount for account holder. The rate of profit/loss is announced by the

bank after the specific period of time.

For all the profit/loss bearing account Zakaat deductions are made. Since PLS account is a profit/loss bearing account the deductions are also made in it. The rate of deductions for Zakaat is announced by the government of Pakistan. In addition to Zakaat deductions, incidental deductions are also made. The account holding can also permit account handling to any other person who must be well known to the bank authorities.

2.2.2 PLS JOINT ACCOUNT

PLS Joint account is opened jointly by more than one persons. Similar to PLS Individual account, the account holders can handle their account to any one, both or to any other person. Since it is a profit/loss bearing account, the profit/loss is calculated by the bank.

This account can not be opened by the names of corporations, enterprises, limited, etc. The PLS Joint account is only permitted if no more than three persons are joining this account.

However, two persons may also jointly open this account. The profit/loss shares are decided similar to the way discussed in PLS Individual account. For this account a single account number is allotted for joint account holders. The account holders can draw a specific amount of money in a specific period of time in both joint and individual account.

2.3 CURRENT ACCOUNT

This account is opened by the corporate bodies.

deducted accordingly to the new contract after the cash drawing time. From then onwards the profit rate is decided according to the new contract.

The Term Deposit account is also called as Fixed Deposit account. It is opened for at least seven days and at the most for five years. The former is called short term deposit and the later as long term deposit.

2.5 DAILY TRANSACTIONS

Daily transaction is considered as a step towards the updation of an account. The updation of an account is possible by the following methods.

- _ DEPOSITING CASH

- _ DRAWING CASH

2.5.1 DEPOSITING CASH

The cash may only be deposited in PLS and Current accounts. The amount deposited by the client goes into the credit column of that particular date.

2.5.2 DRAWING CASH

The cash may be drawn from any of the three accounts discussed earlier. The amount goes into the debit column of that date.

2.6 DAILY CASH CLOSING

The transactions taking place for depositing or drawing the cash is registered accordingly to credit or debit columns of that date. Whenever the ending cash of that date is to be determined, all the transactions happening in that are collected. Total credit and debit entries are summed up and finally the result is obtained.

2.7 RECORD KEEPING

Any client can ask his balance by telling his account number. The account number is confirmed by the name of client entered at the time of account opening.

2.8 ACCOUNT CLOSING

Any client can close down his/her account, if willing, by drawing all the cash from the account. The record of account holder with such an account number remains no more in the records of bank. The forms of existing system are attached in Appendix C.

✓ 2.9 DRAWBACK IN THE PRESENT SYSTEM

During the system study the following drawback were detected in the existing system.

- ✓ Efficiency *security*
- ✓ Storage Media
- ✓ Wastage *security*
- ✓ Information Handling
- ✓ Manual System Errors
- ✓ Redundancy
- ✓ Expensive *Reports Accurate*

2.9.1 EFFICIENCY

As the time factor plays an important role in the efficiency of the system, so the present manual system is a system, thus making it an inefficient one. As the activities of the system are interdependent so the delay of one activity can cause the delay in other activities.

2.9.2 STORAGE MEDIA

Considering the storage media as another important factor, all the information and any type of data is being stored on paper files, registers, etc. which are liable to be lost or destroyed with the passage of time. So the present system is not adequate. Also the records reside on registers so access, updation, deletion and insertion of any particular record will surely take a long time. This aspect presents a serious drawback specially when the time limit is very short.

2.9.3 WASTAGE

Huge registers have to be maintained for the purpose of handling data and related informations which results in the worthless extra efforts as well as the wastage of large volume of stationary.

2.9.4 INFORMATION HANDLING

The information handling is also very difficult task in the existing system because all the informations are recorded on the paper.

2.9.5 MANUAL SYSTEM ERRORS

All the calculations in the present information retrieval system are carried out manually which can cause errors. So the results compiled by the individuals have errors which when detected take a lot of time for corrections and chances of errors increase with the increase of data. So the present system needs a lot of laborious work.

2.9.6 REDUNDANCY

There is high level of redundancy from the storage point of view in the present system. All the informations stored

on the paper causes more space to be occupied which in turn causes wastage of time, stationary and manpower. In the present system the duplication of work is also considerable.

2.9.7 EXPENSES

It requires more effort to be put by the staff of account handling department, it is not only cumbersome but also implies more expenses.

CHAPTER THREE

PROPOSED SYSTEM

PROPOSED SYSTEM

3.1 INTRODUCTION

For every system to be computerized a suitable designing and programming phase is needed. This phase leads to a system for the proposal of computerization of existing system. The proposed system may not be a lifetime system but it may run for the present by fulfilling the requirements of the organization.

The following sections contain the proposals to computerize the accounting system of Allied Bank Limited, Pakistan. This system will be discussed in terms of Inputs, Processing and Outputs.

3.2 INPUTS

After studying the manual system of ABL in depth, the input to the accounting system are dependent on the data forms of bank. The forms which are necessary as input to the system for getting necessary reports and other information for the proposed system are given below:

- _ PLS Account
- _ Current Account
- _ Term Deposits
- _ Daily transaction
- _ Daily cash closing
- _ Cheque book required
- _ Cheque books obtained
- _ Accounts closing

The sample of input forms are attached in Appendix

C.

3.2.1 PLS ACCOUNT

The particulars of the candidate opening account will be fed to the computer. The following editing checks will be made by the program for the sake of accuracy.

- _ Name(s)
- _ Initial deposit
- _ Number of account handling authorities
- _ Introducer's account number
- _ Introducer's name
- _ Account opening date

In the existing system there has been only a single entry to enter an account handling authority's name. If the number of account handling authorities is more than one, the space is provided in the proposed shape of forms. A code has been entered which shows the marital status of the account holder. Since the project is being done for Zonal Office, Rawalpindi, the entry for the branch name has been removed. All the informations will be stored into the files. So the informations relating to ledgers have also been removed. As the signatures can not be fed into the computer, the entries for the signature of client, introducer and manager have been removed. This account has the following types:

- _ PLS individual account
- _ PLS joint account

3.2.1.1 PLS INDIVIDUAL ACCOUNT

This account is opened by a single person. After entering the particulars the permission is granted

by the manager of the branch. As the permission is granted an account number is allotted to the client by the computer and is consequently displayed on the screen. If the permission is not granted, the client is informed through a message displayed on the screen.

3.2.1.2 PLS JOINT ACCOUNT

This account may be opened by more than one but not more than three persons jointly. For each client the particulars accepted by the computer. If for any of these persons the account opening is not permitted the other persons along with that one could also not open the account. After getting the particulars for each person the account permission is taken from the manager. As the account opening is permitted an account number is issued to each of these persons separately by the computer. In fact the first six digits for the persons opening a joint account are same and the last one varies. This last digit shows the serial number which is a part of this account number.

3.2.2 CURRENT ACCOUNT

This account is opened by the name of corporations, enterprises, limited, etc. Similar to PLS account the particulars of the account opening organization are entered. After getting the permission for account opening the account number is issued by the computer.

The following editing checks will be made by the program for the sake of accuracy.

- _ Name
- _ Initial deposit

- _ Number of account handling authorities
- _ Introducer's account number
- _ Introducer's name
- _ Account opening date

A single entry by the name 'special instruction' is used for account handling authority. In the proposed system it is replaced by the particulars (name, address, occupation) of account handling authority. Moreover, for more than one account handling authority the space is provided. The entries for signatures, branch name and the section of form for bank's use is removed.

3.2.3 TREM DEPOSITS

This account is opened by the persons who want to deposit their money for a specific period of time. After entering the particulars of client(s) account opening permission is taken. If it is permitted the account number is issued by the computer.

The following editing checks will be made by the program for the sake of accuracy.

- _ Name(s)
- _ Amount
- _ Number of account handling authorities
- _ Introducer's account number
- _ Introducer's name
- _ Period (in years)
- _ Account opening date
- _ Due date

The forms used for the existing system contains the

entries of date of payment, profit/loss amount, initials (signatures), PLS term deposit number which are removed from the proposed shape of forms. As all the informations are to be kept in computer, there is no more need of these entries.

3.2.4 DAILY TRANSACTIONS

The transaction take place in which amount is debitted or credited. For such transactions the input is given to the computer.

The following editing checks will be made by the program before writing the files.

- _ Date
- _ Cheque number/Slip number
- _ Amount debitted/Amount credited

3.2.5 DAILY CASH CLOSING

The daily cash closing is used to retrieve informations of cash debitted and credited on a certain date. The total amount of cash deposited and the cash drawn is displayed on the screen. The editing check for the field 'date' is made by the program.

~~3.2.6~~ CHEQUE BOOK REQUIRED

When a client requires a new cheque book the account number of this client is given to the computer. The number of cheque books obtained by the client increases by one. The editing check for the field 'account number' is made by the program.

3.2.7 CHEQUES BOOKS OBTAINED

For the management to know how many chequeu books a certain client has taken, the account number of that client is

given as input to the computer. The editing check for the field 'account number' is made by the program.

3.2.8 ACCOUNTS CLOSING

If a client wants to close the account, his/her account number is given to the computer as an input. If a person with a joint account wants to close the account, it will be closed for the other partners too who join this account. An editing check of field 'account number' is made by the program for the sake of accuracy.

3.3 OUTPUTS

There are two type of outputs which can be have by the computerized system.

- _ Printed reports
- _ Screen displays

3.3.1 PRINTED REPORTS

Following are the printed reports generated from the computer.

- _ Record of client
- _ Cash closing report
- _ Periodic report
- _ Detailed report

3.3.1.1 RECORD OF CLIENT

The bank requires the printed report of the clients. This report shows the total balance, name, address and number of cheque books obtained by the client.

3.3.1.2 CASH CLOSING REPORT

This report is meant for the banker's

use. This report informs the management how many amount have been deposited and drawn from the bank balance in a single day.

3.3.1.3 PERIODIC REPORT

This report tells the management all about the accounts opened in a specific period of time.

3.3.1.4 DETAILED REPORT

It informs the management about the transactions occurred in a single day and which account number made this transaction.

3.3.2 SCREEN DISPLAYS

In the proposed computerized system the following screen display facilities are available.

- _ Daily cash closing
- _ Number of cheque books obtained
- _ Records of the clients

3.3.2.1 DAILY CASH CLOSING

Daily cash closing at any date shows the total amount deposited and drawn on this day.

3.3.2.2 NUMBER OF CHEQUE BOOKS OBTAINED

Number of cheque books obtained shows the cheque books issued to a certain client.

3.3.2.3 RECORDS OF CLIENTS

This shows the complete record of the client and the total balance kept in account of that client.

3.4 PROGRAMING LANGUAGE

The processing programs of the proposed system are written in Ryan McFarland COBOL (RM COBOL). This language has

been selected due to reason that COBOL is commercial language and it was quite suitable to use this language for a business organization to be computerized.

CHAPTER FOUR

FILE DESIGNING AND DESCRIPTION

FILES DESIGNING AND DESCRIPTION

4.1 PROPOSED FILE ORGANIZATION

File organization is of significant importance regarding the efficiency and storage cost. Here are several factors contributing towards it. These factors are given as follows:

- _ FILE SIZE
- _ RESPONSE TIME

4.1.1 FILE SIZE

Another important consideration is a file size. It makes little sense to use a direct or indexed sequential organization on a file that consumes only a track of disk pack.

4.1.2 RESPONSE TIME

The response time of a file is an important factor which is a measure of the delay between a request for information and receiving an answer. If quick response is needed, sequential access method do not work.

Analysing the proposed files in relation to above discussed factors it has been decided to organize all the information delivering files as indexed sequential.

4.2 FILES SELECTED

The Accounting Information system has been maintained with the support of six files. The three files are master files for each of the PLS, Current and Term Deposit accounts. All these files are discussed below:

- _ IDREES2 FILE
- _ IDREES3 FILE

- _ IDREES7 FILE
- _ IDREES5 FILE
- _ IDREES8 FILE
- _ IDREES9 FILE

4.2.1 IDREES2 FILE

It is one of the three important master files being designed for Accounting Information System. This is a master file for PLS account and accumulates the information for both PLS individual and PLS joint accounts. The record key for this account is account number.

STORAGE DEVICE: Magnetic Disk
 ORGANIZATION : Indexed Sequential
 ACCESS METHOD : Dynamic
 KEY LENGTH : Seven bytes
 RECORD LENGTH : Three hundred and seventy two bytes

The lay out of this file is as shown:

ACC-NO	DAT	NAME	KODE	HF-NAM	ADDRS	TEL-NO
X(7)	9(8)	A(30)	9(2)	A(30)	X(35)	9(9)

ACC-	BAL	INL-DEP	CASTE	ATH-	ATH-	ATH-
TITLE				NAM	ADDRS	OCC
X(20)	9(12)	9(12)	A(25)	A(25)	X(35)	X(25)

< NUM	DUMY	INT-	INT-	INT-	DOMON	MIN-
>		ACC-NO	NAM	ADDR5		BAL
< 9	9(7)	X(9)	A(25)	X(35)	9(8)	9(12)
>						

4.2.2 IDREES3 FILE

It is the master file of current accounts information system. The objective of this file is to store and later retrieve the record of account holders. The number of records go on increasing in this file as more persons open the account. The primary key of this file is account number.

STORAGE DEVICE: Magnetic Disk

ORGANIZATION : Indexed Sequential

ACCESS MODE : Dynamic

KEY LENGTH : Seven bytes

RECORD LENGTH : Three hundred and fifty four bytes

The lay out of this file is given as:

ACC-NO	DAT	NAME	BUS-	BUS-	NUM	OCC >
			ADDR5	TEL		<
X(7)	9(8)	A(30)	X(35)	9(9)	9	X(15) >
						<

< ACC-	BAL	INL-DEP	DUMY	ATH-	ATH-	ATH- >
> TITLE				NAM	ADDR5	OCC <
< X(20)	9(12)	9(12)	9(7)	A(25)	X(35)	X(25) >
>						<

< RES-	RES-	INT-	INT-	INT-	
> ADDR5	TEL	ACC-NO	NAM	ADDR5	
< X(35)	9(9)	X(9)	A(25)	X(35)	FILLER
>					

4.2.3 IDREES7 FILE

This is a term deposit account master file. The objective of this file is to store and retrieve the informations of the account holders. The record key of this file is receipt number.

STORAGE DEVICE: Magnetic Disk

ORGANIZATION : Indexed Sequential

ACCESS MODE : Dynamic

KEY LENGTH : Seven bytes

RECORD LENGTH : Three hundred and three bytes

The lay out of this file is as shown:

RECPT-	ISDAT	NAME	ADDR5	TEL-NO	NUM	PERD
NO						
X(7)	9(8)	A(30)	X(35)	9(9)	9	9

< ACC-	AMOUNT	DDAT	DUMY	ATH-	ATH-	ATH-
> TITLE				NAM	ADDR5	OCC
< X(30)	9(12)	9(8)	9(7)	A(25)	X(35)	X(25)
>						

< INT-	INT-	INT-	
> ACC-NO	NAM	ADDR5	
< X(9)	A(25)	X(35)	FILLER
>			

4.2.4 IDREES5 FILE

This is a daily transaction file. It stores all the

transactions taking place and keeps the records of clients making these transactions. The record key of the file is account number.

STORAGE DEVICE: Magnetic Disk
ORGANIZATION : Sequential
ACCESS MODE : Sequential
KEY LENGTH : Seven bytes
RECORD LENGTH : Forty one bytes

The lay out of this file is as shown:

ACC-NO	DAT	CODE	SC-NO	AMOUNT	COUNTR	
X(7)	9(8)	9(2)	X(9)	9(12)	9(3)	FILLER

4.2.5 IDREES8 FILE

This is a cheque book file. It stores the number of cheque books obtained by a certain account holder against his/her account number. The record key for this file is account number.

STORAGE DEVICE: Magnetic Disk
ORGANIZATION : Indexed Sequential
ACCESS MODE : Dynamic
KEY LENGTH : Seven bytes
RECORD KEY : Twenty seven bytes

The lay out of this file is given as:

ACC-NO	COUNTR	INL-	FINAL-	
		PAGE	PAGE	
X(7)	9(2)	9(9)	9(9)	FILLER

4.2.6 IDREES9 FILE

This is an important file according to the bank's point of view. This is a daily cash closing file. It stores all the amount debitted and credited for each day. This file later retrieve the total amount debitted and credited for a specific day. The record key of this file is date.

STORAGE DEVICE: Magnetic Disk
 ORGANIZATION : Indexed Sequential
 ACCESS MODE : Dynamic
 KEY LENGTH : Eight bytes
 RECORD LENGTH : Thirty two bytes

The lay out of this file is given as:

DAT	CRDT	DBT	
X(8)	9(12)	9(12)	FILLER

4.3 THE FILES RELATIONS

Whenever a database is designed there is some relation among the files. The relation among the files of software developed for ABL are as follow.

The IDREES5 file is linked to IDREES2, IDREES3 and

IDREES7 files through their record keys. Thus the linked files can transfer data to/from each other.

Similarly IDREES8 file is linked to IDREES2, IDREES3 and IDREES7 files through their record keys. Hence these may transfer/change the stored data to/from each other. Whenever a new account is opened the client is given a cheque book. Also whenever a client demands a cheque book, this is entered against his/her account number in IDREES8 file.

The IDREES9 file is linked with IDREES5 file. Whenever a transaction takes place the debitted or credited amount goes into IDREES9 file. This amount is stored in the date of transaction taking place. The two files are linked through field 'date'.

CHAPTER FIVE

SOFTWARE DEVELOPMENT

SOFTWARE DESIGNED

5.1 INTRODUCTION

The system is a conceptual stage of deciding the components of system. Then the components of system are elaborated and programs are developed to achieve the function of these components.

For Accounting Information System a number of programs have been developed. These include creation, maintenance and deletion programs, ensuring the effective operation of the system.

5.2 PROGRAMS DEVELOPED

The programs developed, with their program names are discussed below:

- _ Prog1
- _ Prog3
- _ Prog4
- _ Prog5
- _ Prog11
- _ Prog7
- _ Prog8
- _ Prog9
- _ Prog13
- _ Prog6
- _ Dummy Programs

5.2.1 PROG1

This program displays the main menu for the system. The user opts and gives the choice from the key board

entered in the file whenever a new current account is opened.

COMMENT: The new record is stored in the file whenever a new account is opened.

5.2.4 PROG5

This program creates the master file for Term Deposit account (IDREES7). It is used to store and process the data of different clients. The input and output device of this file is magnetic disk.

INPUT DESCRIPTION: The input for this program is given from the key board. The data may be analysed to process.

OUTPUT DESCRIPTION: The output of this file is the creation of IDREES4 file. It collects the records of account holders. Whenever a new account is opened the record of the account holder is stored in the file.

COMMENT: Whenever a new account is opened, it is entered in the file.

5.2.5 PROG11

The main objective of this program is to handle the daily transaction. Whenever a new transaction occurs the related account is updated. The updated account is rewritten in its file. This program also creates IDREES5 file, used for daily transactions.

INPUT DESCRIPTION: The input for this is entered from the key board. This input proves to be the input for master files of PLS, Current and Term deposit files too. The output of this file is the input of IDREES9 file.

OUTPUT DESCRIPTION: The output of this program is the information displayed about the latest balance of the account

holder immediately after the transaction. It also creates IDREES5 file which is created on the magnetic disk.

COMMENT: This program should be executed whenever a transaction is to take place.

5.2.6 PROG7

This program displays the record of the account holder as stored in the file. Whenever the input is given for this program, it reads the concerned file, searches for the required record and displays it on the screen.

INPUT DESCRIPTION: A part of input for this program comes from the key board or from any of the three master files for PLS, Current and Term deposit accounts.

OUTPUT DESCRIPTION: This program displays the record of the required account holder on the screen.

COMMENT: this program should be executed whenever a record of the client is to be viewed.

5.2.7 PROG8

PURPOSE: This program creates the cheque book file (IDREES8) which stores informations about cheque books. The input and output device for this file is magnetic disk. The program also retrieves the informations about the cheque books. These informations are of two types:

- _ Cheque book required by an account holder
- _ How many cheque books a certain account holder has obtained

When a new cheque book is required by an account holder, he is allotted so. When the bank wants to know the number

of cheque books a certain client has obtained, they do so.

INPUT DESCRIPTION: The input is given through key board.

OUTPUT DESCRIPTION: It creates the IDREES8 file. It also gives the information about the cheque books all concerned to bank and the client.

COMMENT: This program should be executed whenever a client needs a new cheque book or when the bank wants to know how many cheque books have been issued to a client.

5.2.8 PROG9

The objective of the program is to satisfy the bank's management by fulfilling the query of daily cash closing. This program creates a daily cash closing file (IDREES9) which stores the information of cash for a single day. The input and output device of this file is magnetic file.

INPUT DESCRIPTION: A part of input for this program is given through key board. The major part of input is taken from IDREES5 file.

OUTPUT DESCRIPTION: The program creates the IDREES9 file and displays the total amount of cash debitted and credited for a single day.

COMMENT: This program should be executed whenever an information about daily cash closing of bank is to be taken.

5.2.9 PROG13

The purpose of this program is to produce the client's record on the paper for the use of bank as well as for client. An output PRINT-FILE is described in it.

INPUT DESCRIPTION: The input is given from the key board as well as a major part of input is collected from any of the

three IDREES2, IDREES3, IDREES7.

OUTPUT DESCRIPTION: This program produces a hardcopy of the client's record.

COMMENT: This program should be executed whenever a copy of the client's record is to be taken on the paper.

5.2.10 PROG6

This program deletes a record of account holder from the concerned file.

INPUT DESCRIPTION: The input to this program is totally entered from the key board.

OUTPUT DESCRIPTION: The program deletes the record of account holder from the related file, thus making the space free for the coming records to enter into the file.

COMMENT: The program should be executed whenever a client wants to close down his/her account.

5.2.11 DUMMY PROGRAMS

In addition to all the programs discussed earlier some of the dummy programs have also been developed which are meant to enter the data, thus initiating the files for further processing.

CHAPTER SIX

IMPLEMENTATION

IMPLEMENTATION

6.1 INTRODUCTION

Implementation is the process of getting the system design actually in operation. But it is not an easy task, and even for certain situations it is the most difficult of all the system development stages. The reasons could be incapability of staff implementing the system or flaws in the proposed system. So it shows that the computer part of the information system is one fraction of the overall system.

Prior to implementation it is unknown that how the system will behave in real environment. It makes the testing phase modifications necessary for big and effective system implementation. Unfortunately even with strong system study and designing unacceptable results are there.

Extensive and swift feedback including time observations are necessary to convert a design in operation. The implementation phase is firmly aimed at ensuring a smooth and efficient takeover from existing system to the computerized system. So it must be true for all the requirements.

6.2 IMPLEMENTATION PHASE

The implementation phase constitutes following activities:

- _ Testing the system
- _ System conversion

6.2.1 TESTING THE PROPOSED SYSTEM

It is hardly possible to overstress the importance

of testing in system development. The usefulness of new system could only be evaluated by operating it on the actual data of the system. No matter how much thought and foresight goes into development, it is a basic fact that not every aspect has been considered, and foreseen difficulties may arise. Unfortunately program testing with even a wide range of data is not sufficient to determine every bug or errors in the programs. However, such testing is necessary to have any confidence that the programs are adequate. To ensure reliability accuracy all the programs of Accounting Information System have been tested over a wide range of actual data.

6.2.2 SYSTEM CONVERSION

Change from one system to another is called system conversion. There are several conversion methodologies available that will reduce the chance of mishap in a new system. The three basic conversion strategies are as follows:

- _ Direct Conversion
- _ Gradual Changeover
- _ Parallel Changeover

6.2.2.1 DIRECT CONVERSION

When the system is totally different from the existing system, there is no choice but to convert the system once and immediately. The new system becomes operative at the given data and the old one ceases to operate.

6.2.2.2 GRADUAL CHANGEOVER

With this method the system is converted step by step. The operative part of the new system is tested and evaluated and when it becomes perfect, new step of system is

conducted until the system is fully implemented.

6.2.2.3 PARALLEL CONVERSION

Parallel operation is the process of using both the old and the new system at the same time. The results are then compared to verify whether the new system generates the same results as by the old one. The parallel operation is not an easy task because organization has to process everything twice once with old and again with new system.

6.2.3 PROPOSED CONVERSION PLAN

The proposed system is of statistical nature, serving the top and middle management. But there is only manual system existing parallel to it. So the only mechanism left for conversion is of direct changeover. The accuracy on the other hand is highly desirable for the reason that even minute errors will accumulate into huge blunders when reports for senior management will be produced.

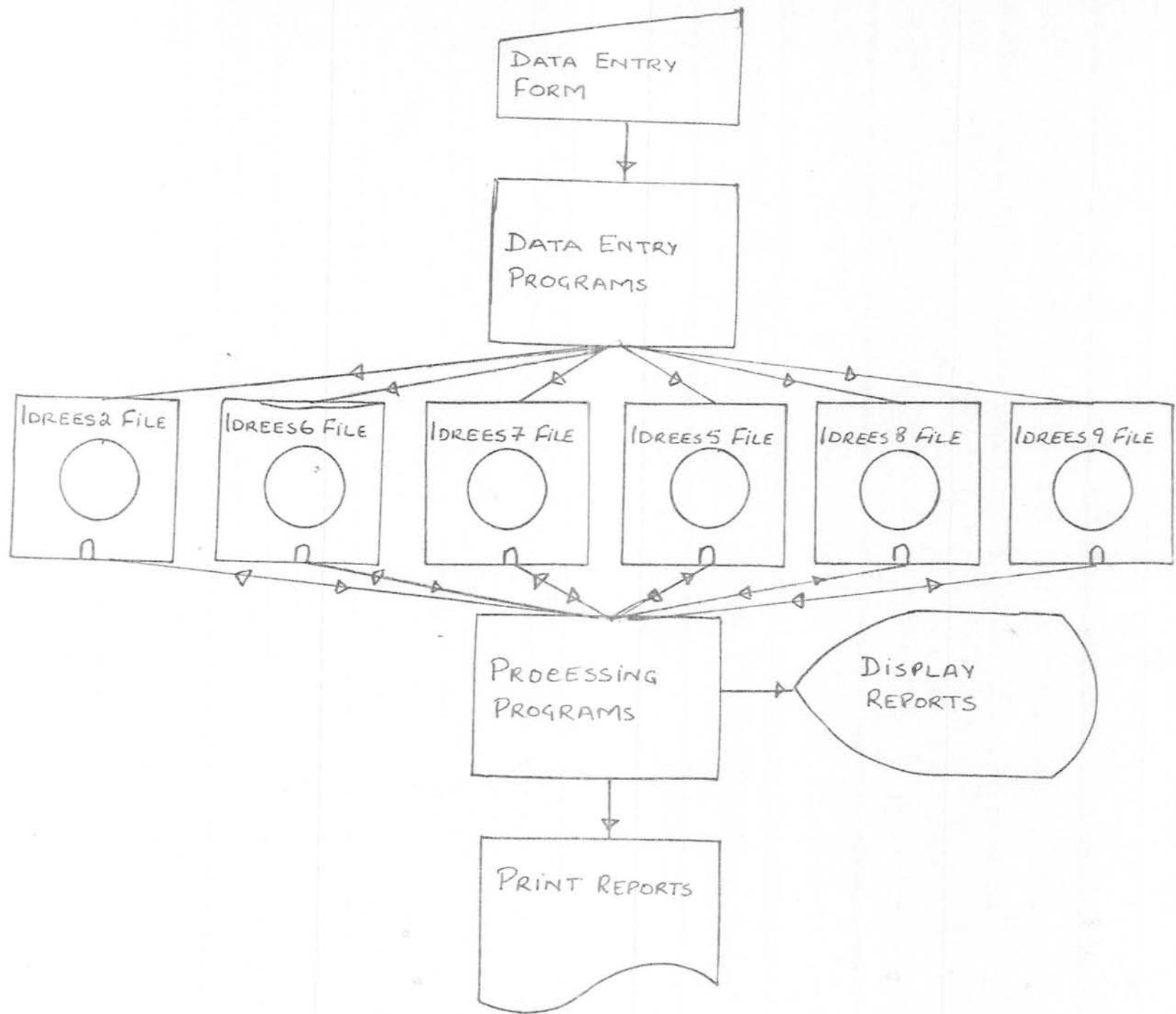
The conversion strategy adapted in the light of all these facts was of direct conversion but extensive measures were taken to safeguard against the errors and omissions. It includes:

_ Available Electronic Verification

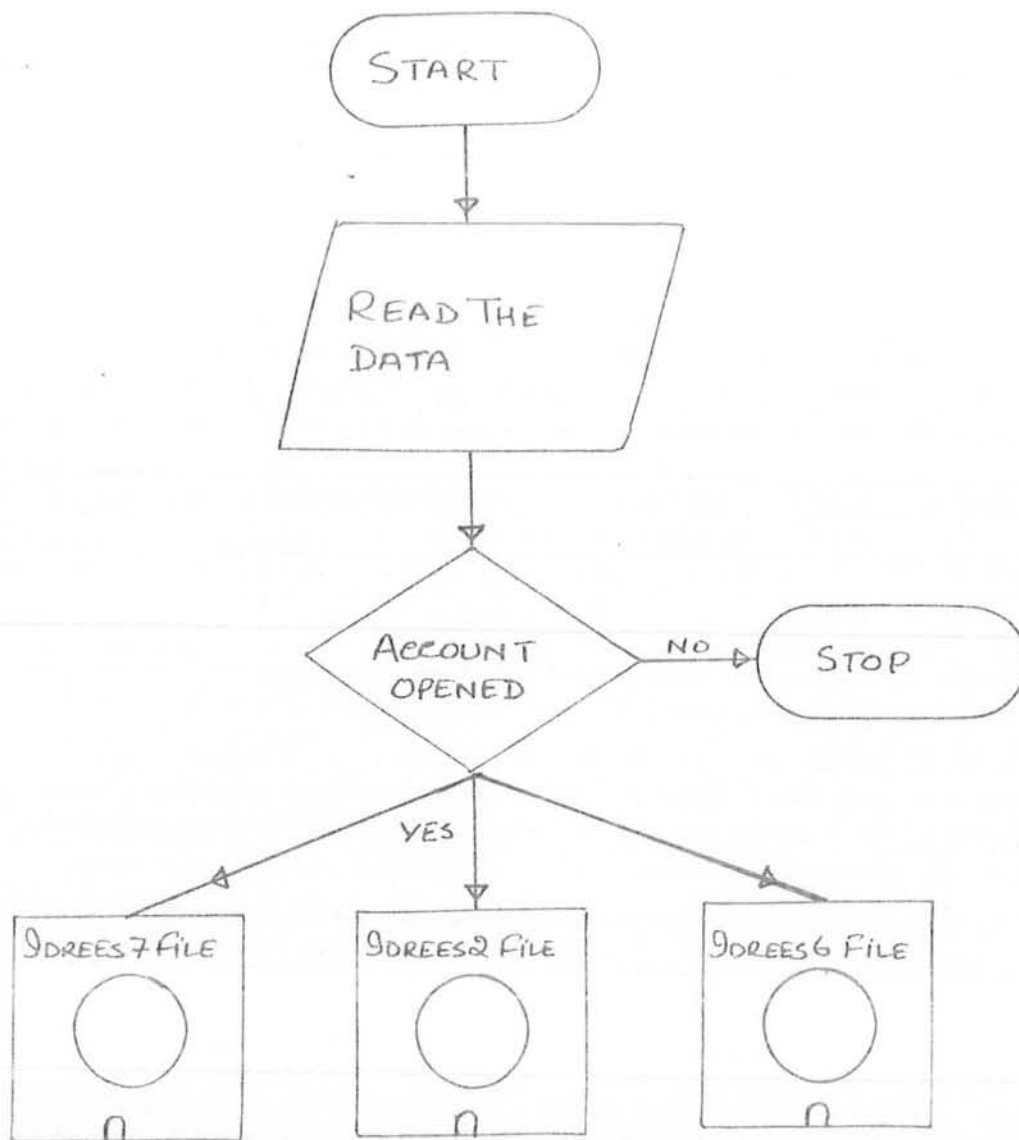
6.2.3.1 AVAILABLE ELECTRONIC VERIFICATION

There was no old computer system doing this job. But there are certain electronically and manually produced informations which are also produced by the proposed system. Such informations were proposed for verifications.

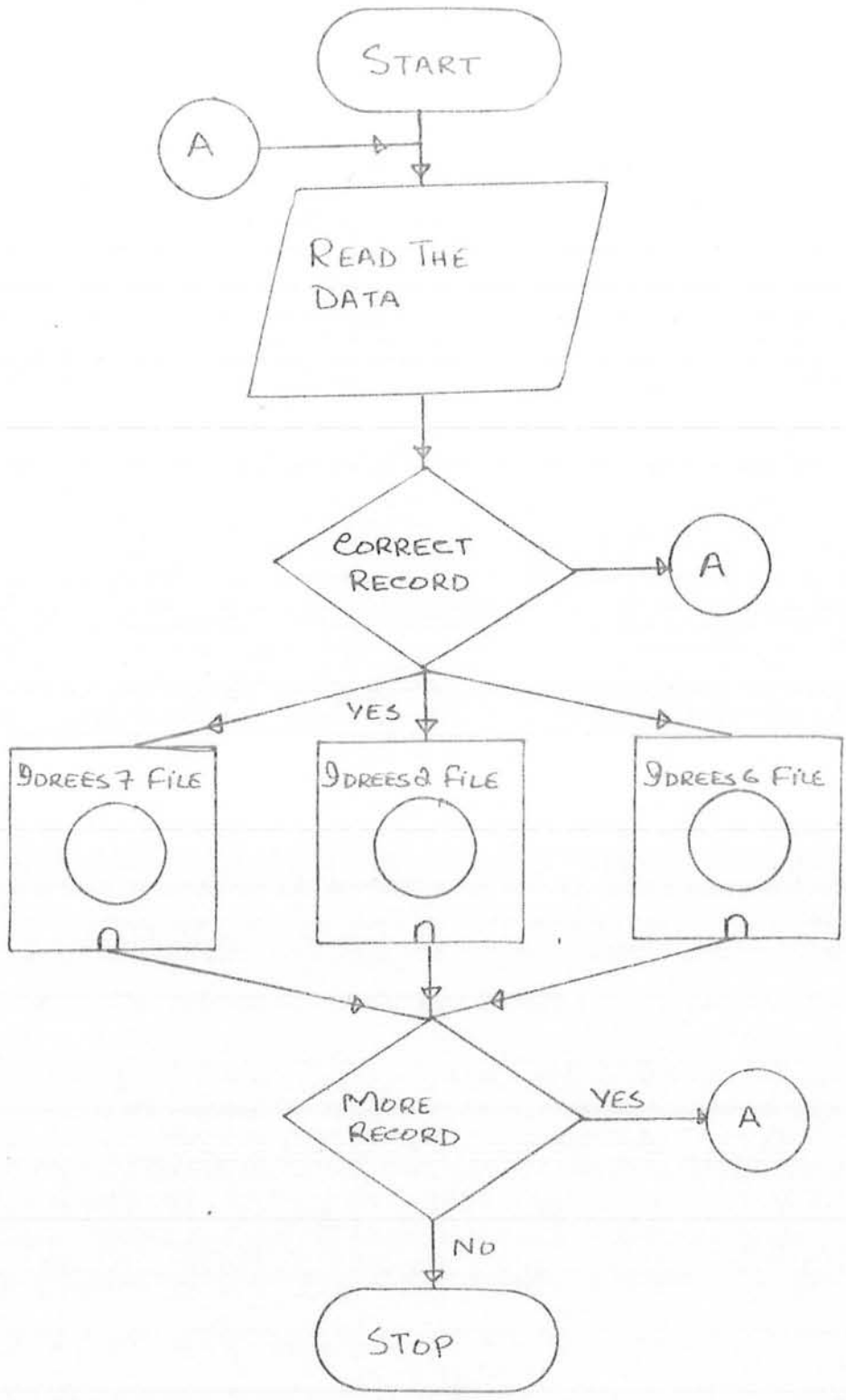
APPENDIX A



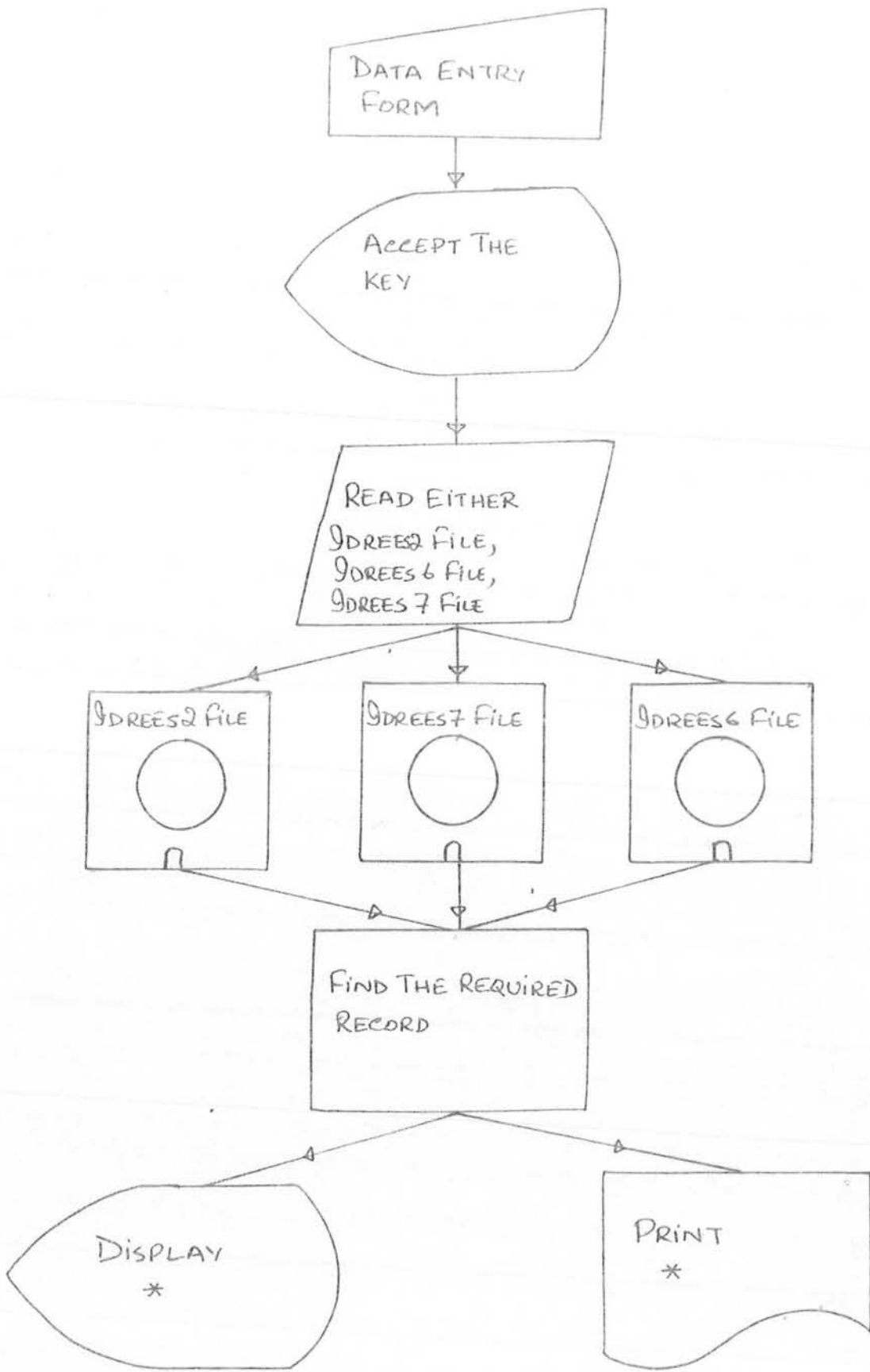
SYSTEM FLOWCHART



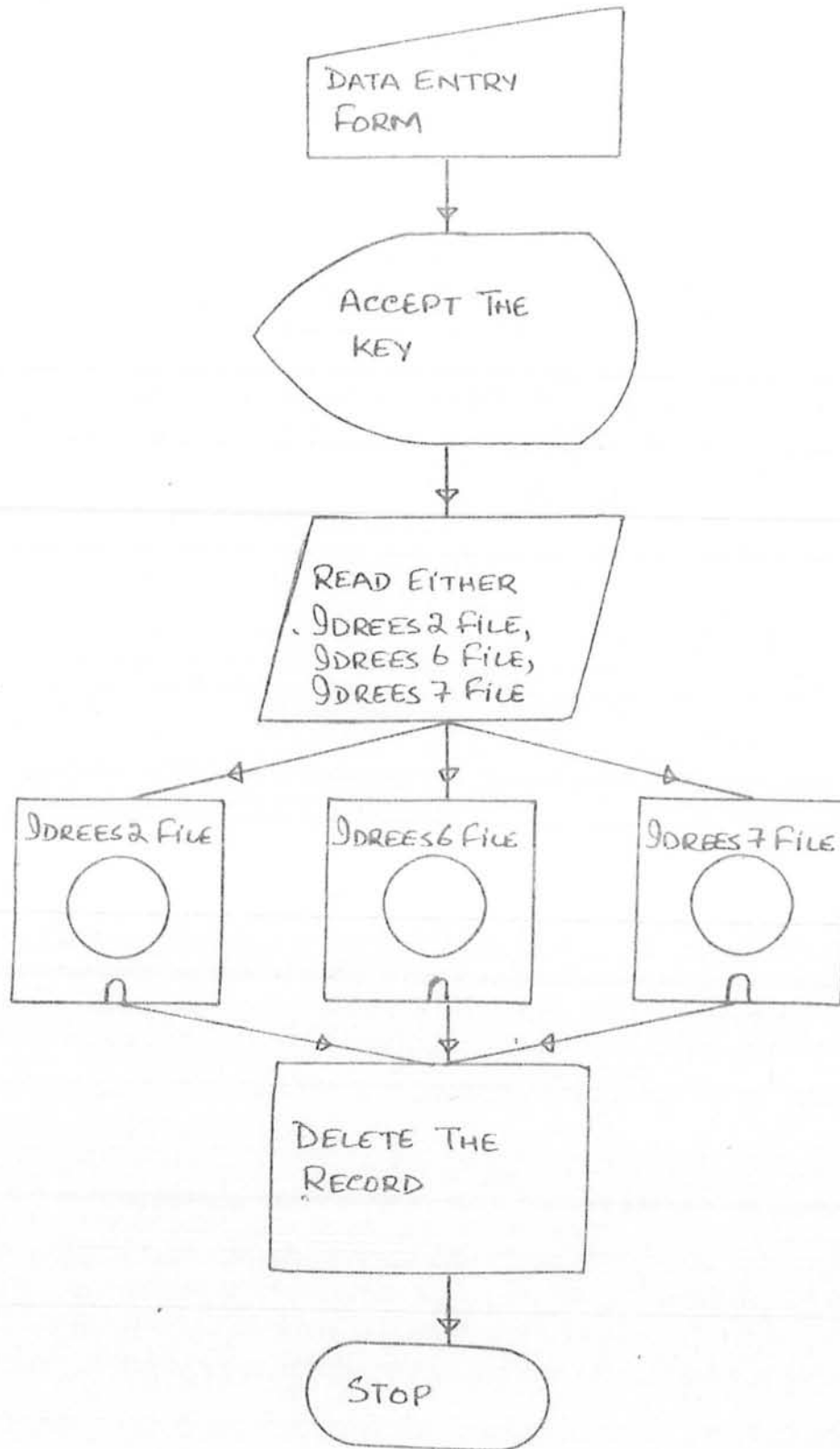
SYSTEM FLOWCHART
OF
PROG3, PROG4, PROG5 (FOR OPENING OF
ACCOUNTS)



SYSTEM FLOWCHART FOR ENTERING THE RECORD



SYSTEM FLOWCHART OF PROG7 (FOR RECORD RETRIEVAL)



SYSTEM FLOWCHART OF PROG6 (FOR DELETION OF RECORD)

APPENDIX B

PLS ACCOUNT OPENING PARTICULARS OF APPLICANT(S)
ALLIED BANK LIMITED ,PAKISTAN.

ACCOUNT OPENING DATE _____

NAME OF THE ACCOUNT _____

ACCOUNT HOLDER'S NAME _____

CODE _____

HUSBAND'S / FATHER'S NAME _____

ACCOUNT HOLDER'S NAME _____

TELEPHONE NUMBER _____

INITIAL DEPOSIT _____

CASTE _____

No. OF ACCOUNT HOLDING PERSONS _____

AUTHORITY'S NAME _____

AUTHORITY'S ADDRESS _____

AUTHORITY'S OCCUPATION _____

INTRODUCER'S ACCOUNT NUMBER _____

INTRODUCER'S NAME _____

INTRODUCER'S ADDRESS _____

CODES AND ABBREVIATIONS

00 = FEMALE UNMARRIED

01 = FEMALE MARRIED

10 = MALE UNMARRIED

11 = MALE MARRIED

CURRENT ACCOUNT OPENING PARTICULARS OF APPLICANT(S)
ALLIED BANK LIMITED ,PAKISTAN.

ACCOUNT OPENING DATE _____

NAME OF THE ACCOUNT _____

ACCOUNT HOLDER'S NAME _____

BUSINESS ADDRESS _____

BUSINESS TELEPHONE No. _____

OCCUPATION _____

RESIDENCE ADDRESS _____

RESIDENCE TELEPHONE No. _____

INITIAL DEPOSIT _____

No. OF ACCOUNT HOLDING PRSONS _____

AUTHORITY'S NAME _____

AUTHORITY'S ADDRESS _____

AUTHORITY'S OCCUPATION _____

INTRODUCER'S ACCOUNT NUMBER _____

INTRODUCER'S NAME _____

INTRODUCER'S ADDRESS _____

TERM DEPOSIT ACCOUNT OPENING PARTICULARS OF APPLICANT(S)
ALLIED BANK LIMITED ,PAKISTAN.

ACCOUNT OPENING DATE _____
ACCOUNT HOLDER'S NAME _____
HIS/HER ADDRESS _____
NAME OF ACCOUNT _____
AMOUNT DEPOSITED _____
TIME PERIOD _____
TELEPHONE NUMR _____
DUE YEAR _____
DUE MONTH _____
DUE DATE _____
No. OF ACCOUNT HOLDING PERSONS _____
AUTHORITY'S NAME _____
AUTHORITY'S ADDRESS _____
AUTHORITY'S OCCUPATION _____
INTRODUCER'S ACCOUNT NUMBER _____
INTRODUCER'S NAM _____
INTRODUCER'S ADDRESS _____

PARTICULARS FOR DEBITTING OR CREDITING AN ACCOUNT
ALLIED BANK LIMITED ,PAKISTAN.

ACCOUNT OPENING DATE _____

YOUR ACCOUNT NUMBER _____

CODE _____

SLIP No. /CHEQUE No. _____

AMOUNT YOU WANT TO DEBIT OR CREDIT —

CODES AND ABBREVIATIONS

01 = FOR DEPOSITING CASH

02 = FOR DRAWING CASH

نفع نقصان میں شراکت کی بنیاد پر بچت حساب کھولنے کی درخواست

APPLICATION FOR OPENING A PROFIT & LOSS SHARING SAVING ACCOUNT

The Manager
 الائید بینک آف پاکستان لمیٹڈ
 Allied Bank of Pakistan Ltd.,

حساب نمبر
 Account No.

شاخ
 Branch _____

تاریخ
 Date _____ 19

بنیاد
 Dear Sir,

میں/ہم نفع نقصان میں شراکت کی بنیاد پر آپ کے بینک میں بچت حساب کھولنا چاہتا/چاہتی/چاہتے ہوں/ہیں اور مندرجہ ذیل رقم آپ کے حوالے کرنا/کرتی/کرتے ہوں/ہیں۔

Being desirous of opening a Saving Account with your Bank on profit & Loss Sharing basis. I/We deposit cash as given below.

میں/ہم اشتراک کرنا/کرتی/کرتے ہوں/ہیں کہ الائید بینک آف پاکستان لمیٹڈ کے نفع نقصان میں شراکت کی بنیاد پر بچت حساب کھولنے کے خواہشمند ہوں/ہیں اور مندرجہ ذیل رقم آپ کے حوالے کرنا/کرتی/کرتے ہوں/ہیں۔

I/We declare that Allied Bank of Pakistan Ltd. PLS A/c., rules enforced have been read by me/us and/or read to me/us and I/we accept them as binding upon me/us. I/we also declare to abide by the rules enforced from time to time. I/we authorise the Bank to invest the amount of my/our deposit in any manner the bank likes under the PLS system. Profit & Loss as determined by the bank will be acceptable to me/us.

حساب کا نام
 Title of Account _____

خصوصی ہدایت
 Special Instruction _____

Name/s with Father's/Husband's name	نام بچہ نام والد/شوہر	Occupation	پیشہ	Address/es	پتہ

دستخط تعارف کنندہ
 Signature of Introduser _____

ابتدائی رقم
 Initial Deposit Rs. _____

تعارف کنندہ کا نام و پتہ
 Introduser's Name & Address _____

مخلص
 Your's faithfully,

حساب نمبر
 Account No. _____ At _____ Branch

برائے استعمال بینک
 For Bank's Use

Approved by the Manager
 Opened by _____ Ledger No. _____ Ledger keeper's Signature

The Manager
 الائید بینک آف پاکستان لمیٹڈ
 Allied Bank of Pakistan Limited,
 شاخ
 Branch _____

بنیاد
 Dear Sir, نفع نقصان میں شراکت کی بنیاد پر بچت حساب نمبر PLS Saving A/c. No. _____

ہر باقی فرسٹا کر مجھے/میں/ہمیں اور اوراق کی چیک ایک نمائندگی کریں اور ایسا تو فرم سے/ہمارے حساب سے منہا کریں۔
 Please supply me/us cheque book containing _____ Leaves and debit Excise duty/charges to my/our account.

پورا نام
 Full Name _____

مخلص
 Your's faithfully,
 دستخط
 Signature _____

پتہ
 Address _____

برائے استعمال بینک
 For Bank's Use

چیک بک جاری کی گئی
 Cheque book (نمبر سے) _____

چیک بک وصول ہائی جس کے اوراق میں نے گنے اور درست پائے
 Received cheque book, leaves of which have been counted by me and found in order.

آفیسر
 Officer
 Glory P. 8-85

دستخط
 Signature _____

جناب
DEAR SIR

مورثہ
DATE _____ 198

برائے مہربانی اپنے بینک کی کتابوں میں میرا/ہمارا مندرجہ ذیل روان حساب کھول دیجئے۔

PLEASE OPEN IN THE BOOKS OF THE BANK A CURRENT ACCOUNT AS FOLLOWS:

حساب کا نام TITLE OF ACCOUNT _____
کاروباری پتہ BUSINESS ADDRESS _____
فون نمبر- PHONE NO _____

مجھے/ہمیں اس قسم کے حسابات کے متعلق بینک کے جملہ قواعد سے واقفیت ہے اور میں/ہم ان قواعد کی پابندی کا اقرار کرتا ہوں/کرتی ہوں کرتے ہیں۔
THE BANK'S RULES FOR THE CONDUCT OF SUCH ACCOUNTS ARE KNOWN TO ME/US AND I/WE HEREBY AGREE TO ABIDE AND BE BOUND BY THEM.

میرا/ہمارا رہائشی پتہ مندرجہ ذیل ہے۔ اس میں تبدیلی کی صورت میں آپ کو فوراً مطلع کروایا جائیگا۔
I/WE GIVE BELOW MY/OUR ADDRESS (ES) AND SHALL INTIMATE TO YOU ANY CHANGE IN THE SAME.

KINDLY SUPPLY ME/US A CHEQUE BOOK
SPECIAL INSTRUCTION
برائے مہربانی میرے/ہمارے نام ایک چیک بک جاری کر دیجئے۔
خصوصی ہدایات
حساب چلانے کے مجاز فرد/افراد

پورا نام FULL NAME	پیشہ OCCUPATION	رہائشی پتہ RESIDENTIAL ADDRESS
		فون نمبر PHONE NO.

دستور کار تقارن کنندہ
INTRODUCER'S SIGNATURE _____
FULL NAME _____
INTRODUCER'S ADDRESS _____
مخلص
YOURS FAITHFULLY

A/C NO _____ AT _____ BRANCH
(FOR BANK'S USE) (برائے استعمال بینک)

APPROVED BY THE MANAGER _____

OPENED BY _____ INITIAL DEPOSIT RS. _____

CHEQUE BOOK
ISSUED FROM NO _____ TO _____ CHECKED BY _____

مینیجر
THE MANAGER
الائیڈ بینک آف پاکستان لمیٹڈ
ALLIED BANK OF PAKISTAN LIMITED

جناب
DEAR SIR,

_____ 198

روان حساب نمبر
CURRENT A/C NO _____

مہربانی فرما کر مجھے/ہمیں اور اسی کی چیک بک عنایت کریں اور ایکسائز ڈیوٹی میرے/ہمارے حساب سے منہا کر لیں۔
PLEASE SUPPLY ME/US CHEQUE BOOK CONTAINING _____ LEAVES AND DEBIT EXCISE DUTY/CHARGES TO MY/OUR ACCOUNT.

پورا نام FULL NAME _____
پتہ ADDRESS _____
مخلص
YOURS FAITHFULLY

(FOR BANK'S USE) (برائے استعمال بینک)
CHEQUE BOOK نمبر سے ISSUED FROM NO _____
چیک بک جاری کی گئی TO _____
چیک بک وصول پائی جس کے اوراق میں نے گنے اور درست پائے
RECEIVED THE CHEQUE BOOK LEAVES OF WHICH HAVE BEEN COUNTED BY ME AND FOUND IN ORDER

OFFICER

SIGNATURE

Rate of profit is dropped if money is withdrawn before the contract time

contracts

P. No. PLS/3

APPLICATION FOR PLS TERM DEPOSITS

The Manager,
 Allied Bank of Pakistan Ltd

Branch _____ Address _____ ✓
 _____ (of A/c. HOLDER)

Dear Sir,

I/We tender herewith in cash/by cheque a sum of Rs. _____
 (Rupees _____ ✓)
 which please place in PLS TERM DEPOSIT ACCOUNT, in the name(s) of _____ ✓

for a period of _____ ✓ month(s)/year(s) on the Profit/Loss Sharing system.
 The deposit should be made payable to me/either of us or survivors/us jointly.
 I/We agree to abide by the Bank's rules governing the PLS Term Deposit Account.
 I/We authorise the bank to invest the deposits in any manner it likes and Profit/Loss as determined by the Bank will be acceptable to me/us.

Yours faithfully,

- | | |
|---------------|-----------------|
| 1. Name _____ | Signature _____ |
| 2. Name _____ | Signature _____ |
| 3. Name _____ | Signature _____ |
| 4. Name _____ | Signature _____ |

PLS Term Deposit Number	Particulars of Receipt(s)	Date of Issue
_____	Amount Name & address ✓	_____
_____	_____	_____
_____	_____	_____

Amount	Due Date	Date of Payment	Profit/Loss Amount	Initial
_____	_____	_____	_____	_____ ✓
_____	_____	_____	_____	_____
_____	_____	_____	_____	_____

APPENDIX C

PARTICULARS OF THE CLIENT AS KEPT IN RECORD FOR
ALLIED BANK LIMITED ,PAKISTAN.

ENTER THE ACCOUNT No:- 1000041
NAME: WAHEED KHERA
TOTAL BALANCE: 000000067600
BUSINESS ADDRESS: FLAT 5 FD PLAZA, RAWALPINDI.
TELEPHONE NUMBER: 000825619
INTRODUCER'S ACCOUNT No: 6767
INTRODUCER'S NAME: KHALID KHAN
INTRODUCER'S ADDRESS: 39-B WESTRIDGE 3, RAWALPINDI.
LAST TRANSACTION: 07/03/1986

B I B L I O G R A P H Y

1. C.ROLLIN NISWONGER & PHILIP E.FESS, ACCOUNTING PRINCIPLES
2. MURDICK, MANAGEMENT INFORMATION SYSTEM
3. WILLIAM S.DAVIS, INFORMATION PROCESSING SYSTEM
4. GERALD A.SILVER, INTRODUCTION TO SYSTEM ANALYSIS
5. ANDREAS S.PHILIPPAKIS & LEONARD J.KAZWIER,
ADVANCE COBOL
6. RM/COBOL MS-DOS USER'S GUIDE, RYAN McFARLAND CORPORATION
7. JOHN WILEY, COMPOUTERISED INVENTORY CONTROL SYSTEM

