LIBRARY DATABASE

3chema for library Database

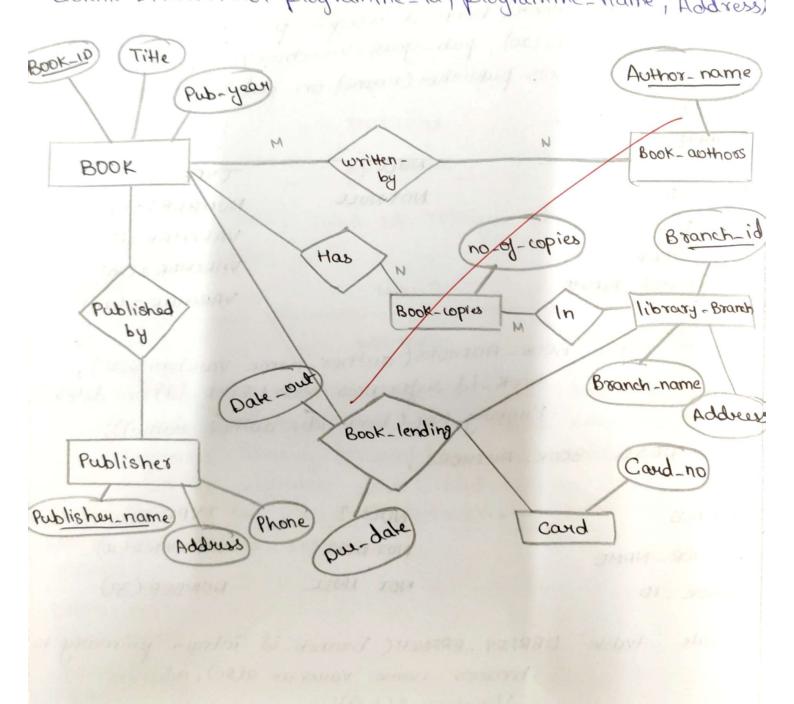
BOOK (BOOK-id, title, publisher_name, Pub-Year)

BOOK-AUTHORS (BOOK-id, Author-Name)

PUBLISHER (Name, Address, Phone)

BOOK- COPIES (BOOK-id, Programme-id, No. of - copies)

BOOK-LENDINGIL BOOK-id, programme-id, card-No, Date-out, Due-Date UBRARY-PROGRAMME (programme-id, programme-name, Address)



Jobble Creation Crosk table Publisher (name Vanchan 2 (20) primary Key, Fhore integer, address Varchar 2(20); SQL> DESC Publishers 2 1-12 E NOUL 7 TYPE NOT NOLL WARCHAR 2(20) Part -NUMBER (38) F-ONE Vanchax 2(20) ACCRESS. Creak table brok (book id integer primary key, title Vanchar 2 (20), pub-year Vanchar 2 (20), publisher-name references publisher (name) on delete cascade); DESC BOOK! PATTERNIT . NULL ? TYPE NUMBER (38) NOT WOLL BUCK- ID VARCHAR 2(20) THILE VARCHAR 2 (20) PUB_ YEAR POPUSHER MAME VARCHAR 2(20) Create table Book-AUTHORS (author-mame Vanchau 8(20), book-id suprunces book (book-id) on delek Caxol Primary Key (book-id, author-name); SALD DESC BOOK_ RUTHORS; TYPE MULL? WITH THE VARCHAR 2 (20) LIDIA TOW MITHER - WITHE HUMBER (38) LUDER TOLK EGEN _ IID Conche tobbe DEFARY EFFANCH (branch-id integer primary kay branch - name Vanchan 2(50), address

Varichan 2 (50));

	BRARY_ BRANCH'S	
NAME	NOTE;	TYPE
BRANCH-ID	NOT NULL	NUMBER (38)
BRANCH - NAME		VARCHAR 2(50)
ADDRESS		VARCHAR 2(50)
Execute table B	BOOK-COPIES (no-of-copies ferences book (book-id)	s integer, book-id
pron	delete cascade, primary	ig-branch (branch-10
OLY DESC BOO	OK- COPIES;	
NAME	NULL ?	TYPE
NO-OF- COPIES	7770114	NUMBER (38)
BOOK-10	NOT NULL	
ROOK-ID		
100000	200000188	NUMBER (38)
BRANCH-10	NOT NULL	NWBER (38)
BRANCH-10 Create table (NOT NULL	NMBER (38)
BRANCH-10 Create table (NOT NULL CARD (cond- no integu	
BRANCH-10	NOT NULL CARD (cond- DD integu ARD;	NWBER (38);
BRANCH-ID Create table (NOT NULL CARD (cond- no integu	NMBER (38); Type
BRANCH-ID Create table (NOT NULL CARD (cond- DD integu ARD;	NWBER (38);
BRANCH-ID ETERATE Hable (BRIT DESC CA NAME CARD-NO	NOT NULL CARD (cond- no integue ARD; NULL? NOT NULL	NMBER (38) Type NUMBER (38)
BRANCH-ID Literate table (BRIT DESC CA NAME CARD-NO Literate table Br	NOT NULL CARD (cond- no integue ARD; NULL? NOT NULL COK-LENDING (dake-out,	NMBER (38) Type NUMBER (38) due - dak dak, book
BRANCH-10 Create table C BRANCH-10 CREATE TABLE CARD-NO Create table Bo references	NOT NULL CARD (cand - De integue ORD; NOT NULL? NOT NULL OOK-LENDING (dak-out, ces book (book-id) on d	NMBER (38) TYPE NUMBER (38) due - dak dak, book white cascade, brand
BRANCH-10 Create table C BRANCH-10 CREATE TABLE CARD-NO Create table Bo references	NOT NULL CARD (cand - De integue ORD; NOT NULL? NOT NULL OOK-LENDING (dak-out, ces book (book-id) on d	NMBER (38) TYPE NUMBER (38) due - dak dak, book white cascade, brand
BRANCH-10 Create table C BRANCH-10 CREATE TABLE CARD-NO Create table Bo references	NOT NULL CARD (cand - De integue ORD; NOT NULL? NOT NULL OOK-LENDING (dak-out, ces book (book-id) on d	NMBER (38) TYPE NUMBER (38) due - dak dak, book white cascade, brand
BRANCH-10 Liteate table Company CARD-NO Liteate table Book Stepheno Liteate table Book Liteate table	NOT NULL CARD (cand- De integue RD; NOT NULL! NOT NULL COX-LENDING (dak-out, ces book (book-id) on d library-branch (branch, suferences coud (cand- Key (book-id, branch.	NMBER (38) TYPE NUMBER (38) due dake dake, book white cascade, branche (38) on duke cascade, branche (38) no) on delite cascade, branche (38) id, cand-no));
BRANCH-10 LTEATE table C BRANCH-10 LTEATE table C CARD-NO LTEATE table BC STEATE TABLE STEPTIFICES COND Primary SOL> DESC BO NAME	NOT NULL CARD (cand_De integra RD; NOT NULL? NOT NULL COX LENDING (dak_out, ces book (book-id) on d library-branch (branch, usperances coud (cand- Key (book-id, branch.	NMBER (38) Type NUMBER (38) due dake dake, book white cascade, bran white cascade, bran white cascad no) on delite cascad no) on delite cascad id, cand-no);
BRANCH-10 LTEATE table CARD-NO LTEATE Table BO LTEATE Table BO LTEATE TABLE BO LTEATE TO Primary SOL> DESC BO NAME DATE - DUT	NOT NULL CARD (cand_De integra RD; NOT NULL? NOT NULL COX LENDING (dak_out, ces book (book-id) on d library-branch (branch, usperances coud (cand- Key (book-id, branch.	NMBER (38) Type NUMBER (38) due dak dak, book white cascade, brand
BRANCH-10 LTEATE table C BRANCH-10 LTEATE table C CARD-NO LTEATE table BC STEATE TABLE STEPTIFICES COND Primary SOL> DESC BO NAME	NOT NULL CARD (cand_De integra RD; NOT NULL? NOT NULL COX LENDING (dak_out, ces book (book-id) on d library-branch (branch, usperances coud (cand- Key (book-id, branch.	NMBER (38) TYPE NUMBER (38) due dake dake, book white cascade, branche (38) on duke cascade, branche (38) no) on delite cascade, branche (38) id, cand-no));
BRANCH-ID LYEATE table CARD-NO LYEATE Table BO LYEATE TO BOLY DESC BO NAME DATE - DUT DUE - DATE	NOT NULL CARD (cand_De integra RD; NOT NULL? NOT NULL COX LENDING (dak_out, ces book (book-id) on d library-branch (branch, usperances coud (cand- Key (book-id, branch.	NMBER (38) Type NUMBER (38) due dake dake, book white cascade, bran white cascade, bran white cascade no) on delite cascad no) on delite cascad id, cand-no);

* INSERTION OF VALUES INTO TABLES

· Insurtion of Values into publisher table

Insust into publisher Value ('mcgraw-hill', 998 9 076587)

Insert into publisher Values ('pearson', 98890 76565, 'new delhi');
Insert into publisher Values ('random hous', 7455607890', 'hyderoba)
Insert into publisher Values ('hachette livre', 8970862340, 'chennai');
Insert into publisher Values ('grupo planeta', 7756120288, 'bangalore');

SBL > SELECT * FROM PUBLISHER;

NAME	PHONE	ADDRESS	
MCGRAW-HILL	4989076587	BANGALORE	
PEARSON	9889076565	NEMDESHI	
RANDOM HOUS	74556 79345	HYDERABAD	
HACHETTE LIVRE	8940862340	CHENNAI	
GIRUPO PLANETA	7 7 56 120 238	BANGALORE	

· Insurtion of Values, into BOOK Table

Insuit into Book Values (, 'dbms', 'jan-2017', 'magraw-hill');

Insert into BOOK Values (2, adbms, jun-2016, mcgraw-hill);

Tracet into BOOK Values (3, 'cn', 'sep-2016', 'peauson');

Thrust into Book Values (4,1 cg', 'Sep-2015', 'grupo planeta');

Insust into BOOK Values (5, '05', 'may-2016', 'pearson');

SOLT SELECT * FROM BOOK;

BOOK-ID	TITLE	PUB_YEAR	PUBLISHER_ NAME
1	DBMS	JAN-2017	MCGRAW-HILL
2	ADBMS	2011-5016	MCGRAW- HILL
3	CN	SEP-2016	PEARSON
ч	CG	SEP-2015	GROPO PLANETA
5	DS	MAY-2016	PEARSON
			HI .
· Insertic	on of Values in	160 BOOK- author	res Table
Insent 1	nto book-authors	s Valuel 'nava	the', 1);
Insut 1	nto book- author	rs Value ('Nava	athe', 2);
Insert is	nto book - authors	s Valuel 1 tane	nbavm', 3);
	to book-author		
	nto book-author		
	LECT * FROM BOO'		Colors Avenue
ROHTUA	- NAME	BOOK-1	D
HTAVAN	E	was made	* 2)2135 < 18.
		a a	-3/203 - 70-504
		3	
TANEURT		4	
CUI/IDDU	ANGIEL		
EDWARD		5	
GALVIN		5	
GIALVIN			PRY - BRANCH
· Jusenti	on of Value	into 800. UBRE	
GIALVIN • Jusenti • Jusent In	on of Value	into 800. MBRE	nagar', 'bangalore');
GIALVIA Theodic The	on of Value to library-branch	into 800: UBRA ch Values (10, 18	nagar', 'bangalore'); it', 'bangalore');
GIALVIN	on of Value to library-branch to library-branch	into 800: LIBRE ch Value (10, 180) n Value (11, 180) ch Value (12, 180)	nagar', 'bangalore');

BRANCH - 10	BRANCH - NAME	ADDRESS
10	rr nagan	Bangalore
"	Tiens	Bangalore
12 rajaji nagari		Bangalore
13 mitte		mangalore
14	manipal	igibu
Insertion of	Values in BOOK-	copies table
Insult into boo	ok-copies Values 1	(10,1,10);
Insult into book Insult into book Insult into book	DR-copies Values	(5,2,13); (4,3,1w);
Insul into be	FROM BOOK COPIES	(3,9,10);
Insult into be	ook-copies Values	(3,9,11); s; BRANCH-ID
Insul into be	FROM BOOK COPIES	(3,4,11); 5; BRANCH-1D
Justinto bo OL > SELECT & F NO-OF-COPIES	FROM BOOK COPIES	(3,9,11); BRANCH-ID
Justinto bo PL > SELECT # F NO-OF-COPIES	FROM BOOK COPIES	(3,4,11); 5; BRANCH-1D
Just into be all > SELECT & F	PROM BOOK COPIES BOOK ID	(3,9,11); BRANCH-1D
Just into be OL > SELECT # F NO-OF- COPIES 10	FROM BOOK COPIES 800K-10	(3,9,11); BRANCH-ID
Justinto bo PL > SELECT # F NO-OF- COPIES 10 5	PROM BOOK COPIES BOOK 10	(3,9,10); BRANCH-ID 10 11 12 13
Justinto bo PL > SELECT # F NO-OF- COPIES 10 5	PROM BOOK COPIES 800K ID	(3,9,10); BRANCH-1D 10 11 12 13

```
Insulion of
                        in cand table
                 Values
                 card Values (100);
Insult
         Into
                        Values (101);
Insent
                 cand
         into
                 cond Values (102);
Insuit into
Insul into
                 cond Values (103);
                 could Values (104);
 Insult into
SOL? SELECT
                 FROM
                         CARDS;
  CARD- NO
       100
       101
       0 2
       103
        104
· Insurtion of Values in book-lending table
Insuit into book- lending Values (1-jan-17), 1-Jon-17, 1, 10,101)
Thosest into book - lending Values ("11-jan-17," 11-mar-17, 3, 14, 101);
Travet into book-lending Value ('21-feb-17', '21-apr-17', 2, 13, 101)
Insert into book- lending Values ('15-mar-17, 15-jul-17), 7,11,101);
Insult into book-lending talus (12-apr-17), 12-may-17, 1, 11, 104);
SOL > SELECT * FROM BOOK- LENDING!
            DUE-DATE
DATE- OUT
                        BOOK-10
                                   BRANCH-1D
                                                CARD, NO
                                                  101
                             1
                                       10
            01-JUN-17
41-NAZ-10
                                       19
11 - JAN-17 11 - MAR - 17
                            3
                                                  101
21-FEB-17 21-APR-17
                            5
                                       13
                                                  101
15-MAR-17 15-JUL-17
                            4
                                                 101
                                       11
                             1
12-APR-17 12-MAY-17
                                                 104
```

* QUERIES

Publisher, author, no-of-copies in each branch.

sold Select b. book _id, b. title, b. publisher_hame,

a. author-name, C. no_of_copies, I. branch.id

from book b, book-authors a, book-copies c,

where b. book_id = a. book_id

and b. book_id = c. book_id

and 1. branch_id = c. branch_id;

alput

800R-1D	TITLE	PUBLISHER_NAME	3MAM_ROHTUA	No. of copies
1	DBMS	MCGRAW-HILL	3H JAVA VA	10
1	DBMS	MCGRAW-HILL	PHTAVAN	5
2	ADBMS	MCGRAW-HILL	BHTAVAN	2
2	ADBMS	MCGRAW-HILL	3H TAVAU	5
3	CN	PEARSON	TANENBAUM	3
5	0.8	PEARSON	GALVIN	1
4	CG	GIRUPS PLANETA	EDWARD ANG	IEC 3

27 Get the particulars of borrowers who have bowround more than 3 books but from Jan 2014 to jun 2014

301> Select card-no

from book-lending

where dak-out between '01-Jan-2014' and '01-jul-2014'

group by card-no

howing count (*)>3;

Output

CARD-NO

CARD-NO

101

pelete a book in Book table update the contents of other tables suffect data manuplation operation

SAL > DELETE FROM BOOK WHERE BOOK - 10 = 3;

1 row deleted

SQL> Select & from BOOK;

BOOK-10	3 J7/7	PUB_YEAR	PUBLISHER -NAME
1	DBMS	JAN-5017	MCGRAW-HILL
2	2M BOA	JUN-501P	MCGRAW-HILL
Ч	CG	3EP-2015	GRUPO PLANETA
5	0.8	WAY-501P	PEARSON

47 Parkition the BOOK table based on year of publication.

SOL> CREATE VIEW V-publication

AS SELECT pub- year

FROM BOOK;

output View created.

SOL7 SELECT * FROM V- publication

PUB - YEAR

JAN - 2017

JUN - 2016

SEP - 2016

SEP - 2015

MAY - 2016

5 yours selected.

5) Creak View of all books and its number of copies that are currently anallable in the library.

SOL? CREATE VIEW V-BOOK AS

Select b. book_id, b. title, c.no-of-copies

FROM

bookb, book_copies c, library-branch 1

WHERE b. book_id = c.book_id

AND c. branch_id = 1. branch_id;

output

View Created

SOL > SELECT * FROM V_BOOK;

B00K- 1D	TITLE	NO-OF_COPIES
1.	DBMS	HOOR LID
1	DBMS	5 28 3
२	2MBD4	2 3
2	2MBGA	5
3	CN	4
5	OS	203
4	CG	3
7 rows	beleeted.	

A. Gayathari HU21CSEND100966