



KAPSABET

-1-

Name Class..... Index No

Date

Signature

KAPSABET HIGH SCHOOL

451/1
COMPUTER STUDIES
Paper 2
(Practical)
November 2020
2½ hours.

School Examination.
Mock Exams
COMPUTER STUDIES
Paper 2
(Practical)
November 2020
2½ hours.

INSTRUCTIONS TO CANDIDATES:

- 1) If not instructed in the question on where to Type your name and index number ,you must then type them at the top right hand corner of each printout
- 2) Write your name and index number on the CD
- 3) Write the name and version of the software used for each question attempted in the answer sheet.
- 4) Answer all the questions.
- 5) All questions carry equal marks
- 6) Passwords **Should not be used** while saving in the CD
- 7) All answers **must** be saved on your CD
- 8) Make a print out of the answers on the answer sheets provided
- 9) Arrange your printouts and tie/staple them together
- 10) Hand in all **Printouts** and the **CD**.

**This paper consists of 8 printed pages
Candidates should check the question paper to ensure that all the
printed pages are printed as indicated and no questions are missing.**

1. a) (i) Using a desktop publisher software, prepare the logo in **figure 1** below as per the instructions given in **figure 2**. **(21 marks)**



- (ii) Save the logo as **stkeepropel** using the default file type of the desktop publisher software **(2 marks)**

- (iii) Save the logo as **stkeepropelogo** using any of the available image file types. Use either of the following image file formats: png, jpeg, or gif. **(2marks)**



For each of the quarters
Background colour: Red
Font colour yellow

Background colour: blue
Font colour yellow

Figure 2

{LE8E|a3

figure 1

- b) (i) Prepare the news letter on **page 3 (figure 4)** as per layout instructions given in **figure 3** below. **(21 marks)**

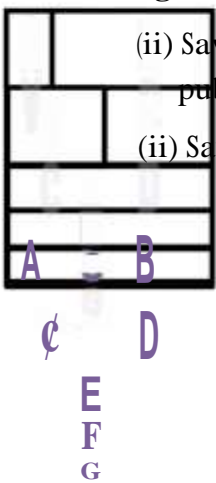


Figure 3

- (ii) Save the newsletter as **stkeepropenews** using the default file type of the desktop publisher software **(2marks)**.

- (ii) Save the newsletter **stkeepropenews** as a **pdf** file type. **(2marks)**

Layout area	Content and Layout instructions
A	<ul style="list-style-type: none"> Insert the school logo created in part a(ii) above
B	<ul style="list-style-type: none"> Insert a text box and fill it with yellow colour Set one text to font size 36 and the other to font size 16. the fonts should be black
C	<ul style="list-style-type: none"> Insert a text box and fill it light grey colour Use font size 12, font type cambria
	<ul style="list-style-type: none"> Text box C, E, F contains the Message from the Head. This is one messages. If flows from text box C, E, then F Ensure that text that overflows from text box C, flow into text box E, and overflow from text box E flows into text box F.
D	<ul style="list-style-type: none"> Insert a text box and fill it light brown colour Use font size 12, font type cambria
E	<ul style="list-style-type: none"> Insert a text box and fill it with ascent 5 (white) darker 5% colour Use font size 12, font type cambria
	<ul style="list-style-type: none"> Insert any picture of your choice and crop it accordingly Format the textbox into 2 columns
F	<ul style="list-style-type: none"> Insert a text box and fill it with ascent 5 (white) darker 5% colour



-3-

7th Term 2 2020

N'&&&C E80 &

\$7 & .5

Message from the Head

Dear Parents and Guardians,

Welcome back to the Covid 19 term! I hope the Pandemic break allowed you to unwind and relax, providing

opportunities for family time. This week we kicked off with Earth day activities, a student led initiative to celebrate Earth Day and educate students about sustainability, our world **and** the impact humans have. I would like to thank Jade and the DI students who led and delivered this initiative.

I would like to alert you to a PTA initiative to host a free E-safety workshop called "ONiine and ME" for students and parents. The

Important events

- 1.October 100** :Covid-19 protocols Orientation
- 2.October 150** :Visit from the Education Office
- 3.October 30m** :New School Chapel Dedication
- 4.November 10th** :Mid term exams
- 5.December 10th** :Pre-Mock exams



workshop will be led by presenters from the Parent Zone, a UK company dedicated to family internet safety; for more details, please click this link <https://parentzone.org.uk/home>. The **aa** parent event will take place on Monday 19th October at 4.30pm and last approximately 1 hour; it is open to all parents. The student experiences will take place on Tuesday 20th October during the school day.

Jack Ole Gunia

Omnes Discipuli Rotundatis

Finally I would like to remind you that October 20 is a National Holiday and therefore the school will be shut. I wish you a wonderful weekend.

Best wishes

Figure 4

2. A systems designer has come up with an exams invigilation system design for **Saint Keeprope Secondary School** as indicated below.

- a) Use these design specification to develop a Relational Database Management System for the school Key in the **sample data** provided by the school. **Save** the database as **SKSSEMS**.

(46 Marks)

Class			Tables		
Field name	Data type	Description	Field name	Data type	Description
ClassID	text	Primary key	ClassID	text	
ClassName	text		ClassName	text	

ExamsTimeTable

Field name	Data type	Description
SubjectID	text	
InvigilatorID	text	Id of teacher who will invigilate the exam
ClassID	text	
ExamDate	Date/time	The date of the exam
ExamStartTime	Date/time	The time (IN AM/PM Format), when the exam will start
ExamStopTime	Date/Time	The time(in am/pm format) when the exam will stop

Students

Field name	Data type	Description
StudentID	text	Primary key
StudentName	text	

Subjects

Field name	Data type	Description
SubjectID	text	Primary Key
SubjectName	text	

Teachers

Field name	Data type	Description
TeacherID	text	Primary Key
TeacherName	text	

Table Relationships/ ERD (Entity Relationship Diagram) for the system

ExamsTimetable Teachers StudentClassEnrolment

Subjects

5

FK1 subjectID

PK TeachersID

FKT StudentID

PK subjectsID	FK2 invigilatorID
SubjectName	FK3 class/D
	ExamDate

teachersname	FK2 Classd
classes	
	Students
PK classID	

ExamStartTime	ExamStopTime	teachersname	PK Student/D
			StudentName

Key PK- Primary Key, FK-- Foreign Key

ExamID	SubjectID	InvigilatorID
ExamDate		ExamTime
ExamStopTime		

ClassID	TeacherID	StudentID
Classname		TeacherName
ClassDate		

ExamID	SubjectID	InvigilatorID
ExamDate		ExamTime
ExamStopTime		

PK	<u>subjectID</u>
	subjectName

PK	<u>classID</u>
	classname
	classDate
	classTime
	classStopTime

PK	<u>teacherID</u>
	teacherName

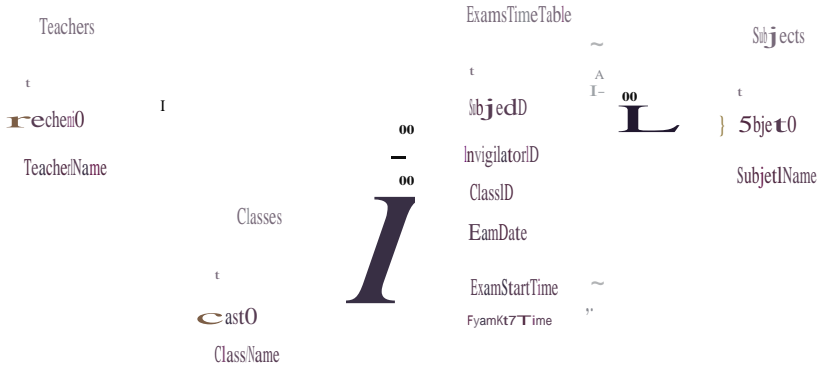
PK	<u>studentID</u>
	studentName

PK	<u>examID</u>
	examDate
	examTime
	examStopTime

Diagram showing relationships between tables: Exam, Teachers, Classes, and Students.

Query Design

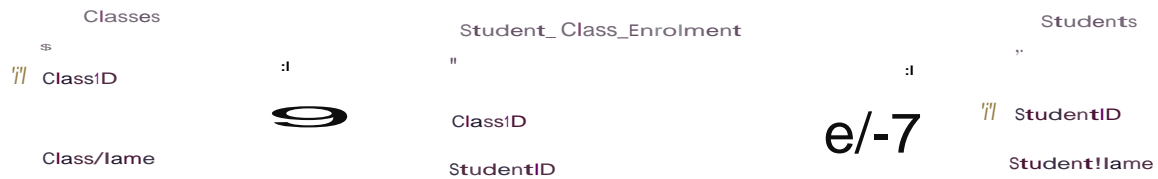
Exams Table Query



field: [SubjectID]	[/ SubjectName]	InvigilatorID	TeacherName	ClassID	ClassName	ExamDate	ExamStartTime	ExamStopTime
Table: ExamsTimeTable	Subjects	ExamsTimeTable	Teachers	ExamsTimeTable	Classes	ExamsTimeTable	ExamsTimeTable	ExamsTimeTable

- A calculated field shall be used to determine the duration of an exam by comparing the exam's start and stop times
- The exams start time shall be used to determine if the exam session is morning or afternoon

Students Class enrolment Query



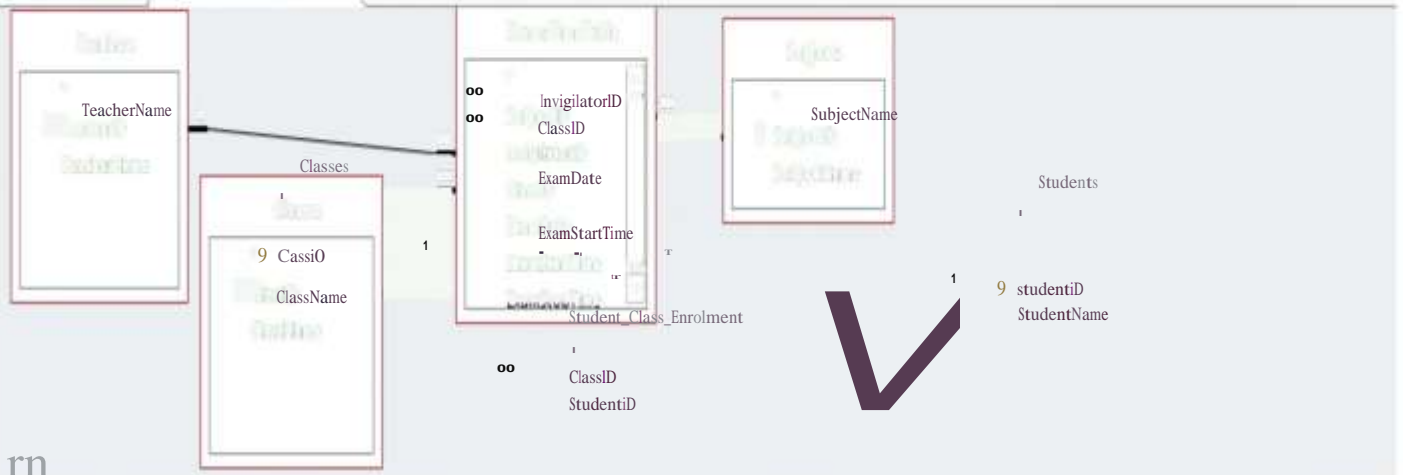
Field: ClassID	Enrolment
Table: Student_Class_Enrolment	

Students Exams Table Query



Entity Design

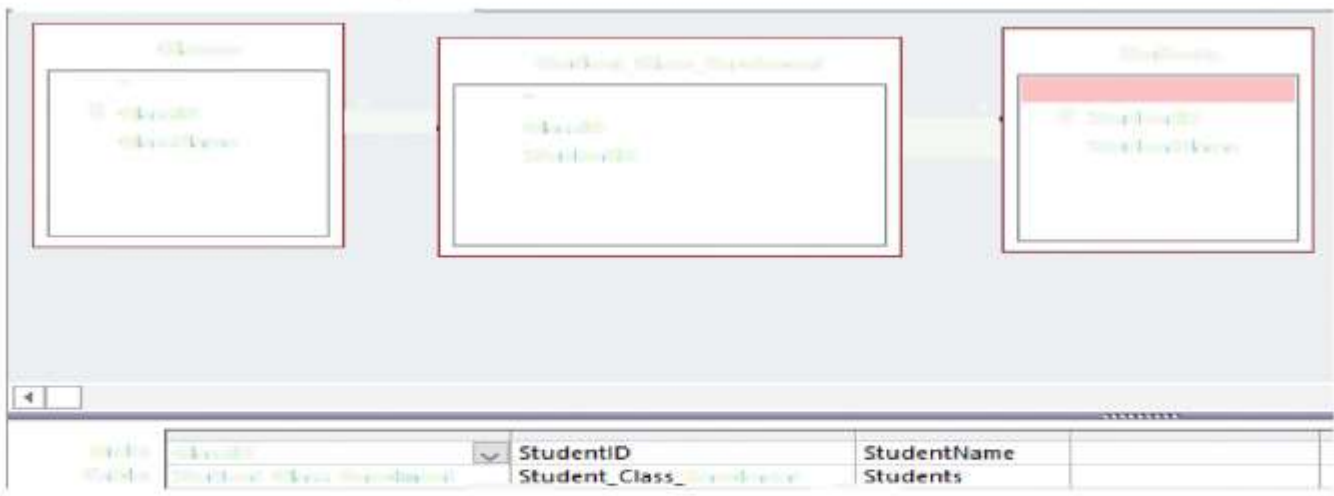
Exam Time Table Query



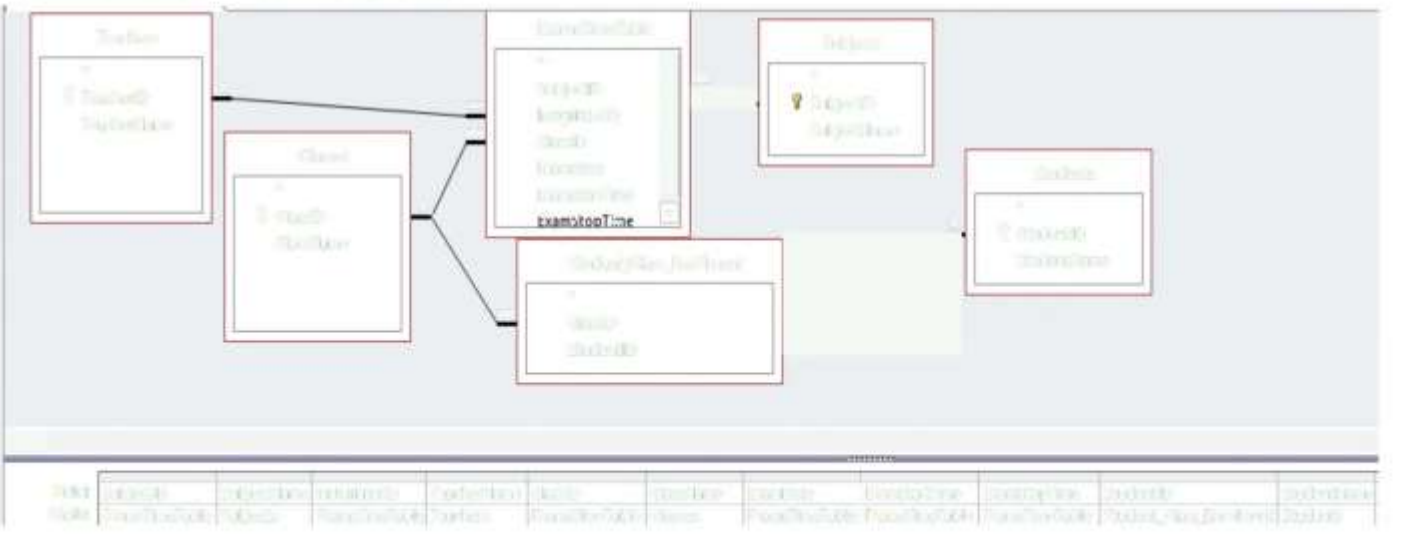
Field	SubjectID	SubjectName	InviigatorID	TeacherName	ClassID	ClassName	Exam Date	ExamStartTime	ExamStopTime	StudentID	StudentName
Table	ExamsTimeTable	Subjects	ExamsTimeTable	Teachers	ExamsTimeTable	Classes	ExamsTimeTable	ExamsTimeTable	ExamsTimeTable	Student_Class_Enrolment	Students
Table	ExamsTimeTable	Subjects	ExamsTimeTable	Teachers	ExamsTimeTable	Classes	ExamsTimeTable	ExamsTimeTable	ExamsTimeTable	Student_Class_Enrolment	Students

- A calculated field will be used to determine the duration of an exam by comparing the exam's start and stop times
- The exam stop time will be used to determine if the exam starts in morning or afternoon

Students Class enrolment Query



Students Class enrolment Query



Field	ClassID	SubjectID	InviigatorID	TeacherName	ClassID	ClassName	Exam Date	ExamStartTime	ExamStopTime	StudentID	StudentName
Table	ExamsTimeTable	Subjects	ExamsTimeTable	Teachers	ExamsTimeTable	Classes	ExamsTimeTable	ExamsTimeTable	ExamsTimeTable	Student_Class_Enrolment	Students

Reports

Exam Time Table(This shall be based on the exam time table query)

Exams Time Table

Exam Date	Session	Class	Subject	Start	Stop	Duration	Invigilator
Monday, 22 March 2021							
	Morning	FORM 1	MATHEMATICS	08:00am	09:30 am	1:30	MRS. MAKUMI
		FORM 2	COMPUTER STUDIES	08:00 am	10:00am	2:00	MS. SIXITA
		FORM4	COMPUTER STUDIES	08:00 am	10:30 am	2:30	MS. TUMBILI
	Afternoon	FORM 1	ENGLISH	02:00pm	04:30 pm	2:30	MS. TUMBILI
		FORM2	ENGLISH	02:00 pm	04.00 pm	2:00	MRS. MAKUMI
Tuesday, 23 March 2021							
	Morning	FORM 1	KISWAHILI	08:00am	10:45 am	2:45	MR. MATATU
		FORM 2	KISWAHILI	08:00am	10:30 am	2:30	MRS. ENANE
		FORM 3	COMPUTER STUDIES	08:00 am	10:30am	2:30	MS. TUMBILI
	Afternoon	FORM 1	COMPUTER STUDIES	02:00pm	04:15 pm	2:15	MR. KETANO
		FORM 2	MATHEMATICS	02:10 pm	04:00 pm	1:50	MRS. MAKUMI

Invigilators Exam Time Table Report (This shall be based on the exam time table

Exams Time Table

Invigilator	Exam Date	Session	Class	Subject	Start	Stop	Duration
MR. KETANO	Tuesday, 23 March 2021	Afternoon	FORM 1	COMPUTER STUDIES	02:00 pm	04:15 pm	2:15
	Wednesday, 24 March 2021	Morning	FORM3	ENGLISH	08:00 am	10:20am	2:20
	Thursday, 25 March 2021	Afternoon	FORM4	MATHEMATICS	02:00 pm	04:30 pm	2:30
MR.MATATU	Tuesday, 23 March 2021	Morning	FORM 1	KISWAHILI	08:00 am	10:45 am	2:45
	Wednesday, 24 March 2021		FORM4	ENGLISH	08:00 am	10:15 am	2:15
MRS. ENANE	Tuesday, 23 March 2021	Morning	FORM2	KISWAHILI	08:00 am	10:30 am	2:30
	Friday, 26 March 2021		FORM4	KISWAHILI	08:00 am	10:00am	2:00

Class Exam Time Table(This shall be based on the exam time table query)

Exams Time Table

Form	Exam Date	Session	Class	Subject	Start	Stop	Duration	Invigilator
FORM1	Monday, 22 March 2021	Morning		MATHEMATICS	08:00 am	09:30 am	1:30	MRS. MAKUMI
	Tuesday, 23 March 2021	Morning		KISWAHILI	08:00 am	10:45 am	2:45	MR. MATATU
	Monday, 22 March 2021	Afternoon		ENGLISH	02:00 pm	04:30 pm	2:30	MS. TUMBILI
	Tuesday, 23 March 2021	Afternoon		COMPUTER STUDIES	02:00pm	04:15 pm	2:15	MR. KETANO
FORM2	Monday, 22 March 2021	Morning		COMPUTER STUDIES	08:00am	10:00 am	2:00	MS. SIXITA
	Tuesday, 23 March 2021	Morning		KISWAHILI	08:00 am	10:30 am	2:30	MRS. ENANE
	Monday, 22 March 2021	Afternoon		ENGLISH	02:00 pm	04:00 pm	2:00	MRS. MAKUMI
	Tuesday, 23 March 2021	Afternoon		MATHEMATICS	02:10 pm	04:00 pm	1:50	MRS. MAKUMI

Class Exam Time Table(This shall be based on the student exam time table query)

Exams Time Table

Student ID	Name	Exam Date	Session	Class	Subject	Start	Stop	Duration	Invigilator
ST9	NINE TISA	Tuesday, 23 March 2021	Morning	FORM3	COMPUTER STUDIES	08:00 am	10:30 am	2:30	MS. TUMBILI
		Friday, 26 March 2021	Morning	FORM3	KISWAHILI	08:00 am	10:00 am	2:00	MS. SIXITA
		Wednesday, 24 March 2021	Afternoon	FORM 3	MATHEMATICS	02:00pm	04:30 pm	2:30	MS. SIXITA
		Wednesday, 24 March 2021	Morning	FORM3	ENGLISH	08:00 am	10:20 am	2:20	MR. KETANO
ST8	EIGHTNANE								

INPUT SCREEN DESIGN (FORMS)

Main Menu

SAINT KEEPROPE SECONDARY SCHOOL
EXAM INVIGILATION MANAGEMENT
SYSTEM

Classes

Prepare Exam Time
Table

REPORTS

Overall Exams TimeTable

Invigilators Exams

TimeTable Class Exam

TimeTable Students Exam

Timetable

Exit System

Students

Subjects

Name EIGHTNANE

Name MATHEMATICS

Name MRS. MAK(MI

Students Classes Enrolment
First Record | Next Record | Previous Record | Last Record | Close

Home

Exam Time Table

FORM 1

Manage Classes | Manage Students | Enroll Students To Class

CLASS MEMBERS | Manage Teachers | Progress Report

Class ID: [] Class Name: FORM 1

InvigilatorID: [] Invigilator Name: MRS. MAKUMI

Subject ID: [] SubjectName: MATHEMATICS

Exam Date: Monday, 22 March 2021

Find Record | Add Record | Delete Record

Navigation: First Record, Next Record, Previous Record, Last Record, Close

Exam Duration

ExamStop Time

Session: Morning

ID: [SB101] Find Record

Navigation: First Record, Next Record, Previous Record, Last Record, Close

Delete Record

Teachers

ID: [T10] Find Record

Name: [] Add Record

Delete Record

Navigation: First Record, Next Record, Previous Record, Last Record, Close

StudentID	StudentName
ST1	ONE MOJA

Class ID: F1

Class Name: T10

InvigilatorID: SB101

Invigilator Name: []

Subject ID: []

Subject Name: []

Exam Date: []

Exam Time: 09:30 am

Exam Stop Time: 1:30

Exam Stop Time: []

Navigation: First Record, Next Record, Previous Record, Last Record, Close

SAMPLE DATA

allasses \

ClassID	ClassName
F2	FORM2
F3	FORM3
F4	FORM4

Subjects

SubjectID	SubjectName
SB102	ENGLISH
\$B103	KISWAHILI
5B451	COMPUTER STUDIES

ExamsTimeTable

SubjectID	InvigilatorID	ClassID	ExamDate	ExamStartTime	ExamStopTime
		F1	22/03/2021	08:00am	09:30 am
\$B102	T2	F1	22/03/2021	02:00 pm	04:30 pm
SB103	13	F1	23/03/2021	08:00 am	10:45 am
\$B451	T5	F1	23/03/2021	02:00 pm	04:15 pm
SB451	T6	F2	22/03/2021	08:00 am	10:00 am
SB102	T10	F2	22/03/2021	02:00 pm	04:00 pm
SB103	T8	F2	23/03/2021	08:00 am	10:30 am
\$B101	T10	F2	23/03/2021	02:10 pm	04:00 pm
SB451	T2	F3	23/03/2021	08:00 am	10:30 am
SB102	T5	F3	24/03/2021	08:00 am	10:20 am
\$B101	T6	F3	24/03/2021	02:00 pm	04:30 pm
SB103	T6	F3	26/03/2021	08:00 am	10:00 am
SB451	T2	F4	22/03/2021	08:00 am	10:30 am
SB102	13	F4	24/03/2021	08:00 am	10:15 am
\$B101	T5	F4	25/03/2021	02:00 pm	04:30 pm
SB103	T8	F4	26/03/2021	08:00 am	10:00 am

student_Class_Enolment

ClassID	StudentID
F4	ST10
F4	ST11

Students

StudentID	StudentName
ST10	EIGHT NAME
ST11	ELEVEN NAME(A)

Teaches

TeacherID	TeacherName
T10	MRS. MAKUMI
T12	MS. TUMBILI

