Tishk International University
Department of Information Technology
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Database Systems I

Lecture 1
Practical

Introduction to MS Access

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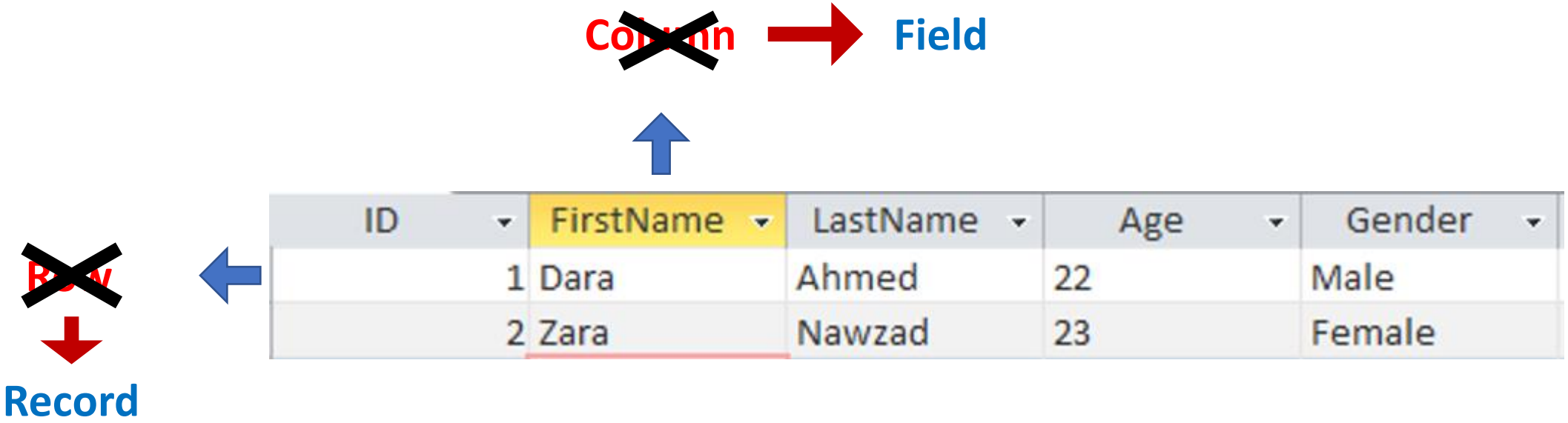
MS Access

- MS Access is an easy-to-use tool for creating various kinds of applications.

- Access can help us create applications in a minimal amount of time.

- It is a Rapid Application Development Tool.

Database Terms



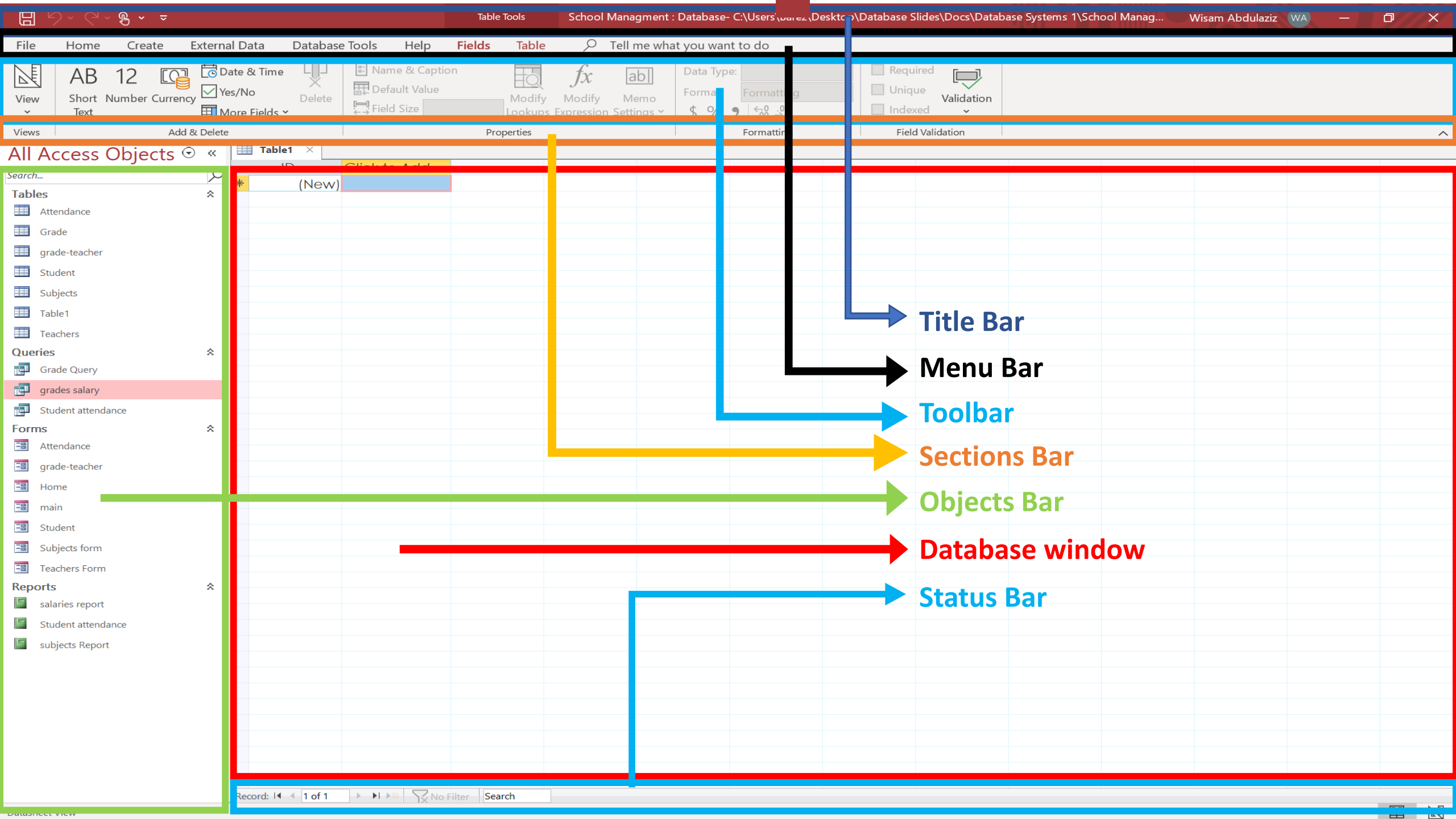


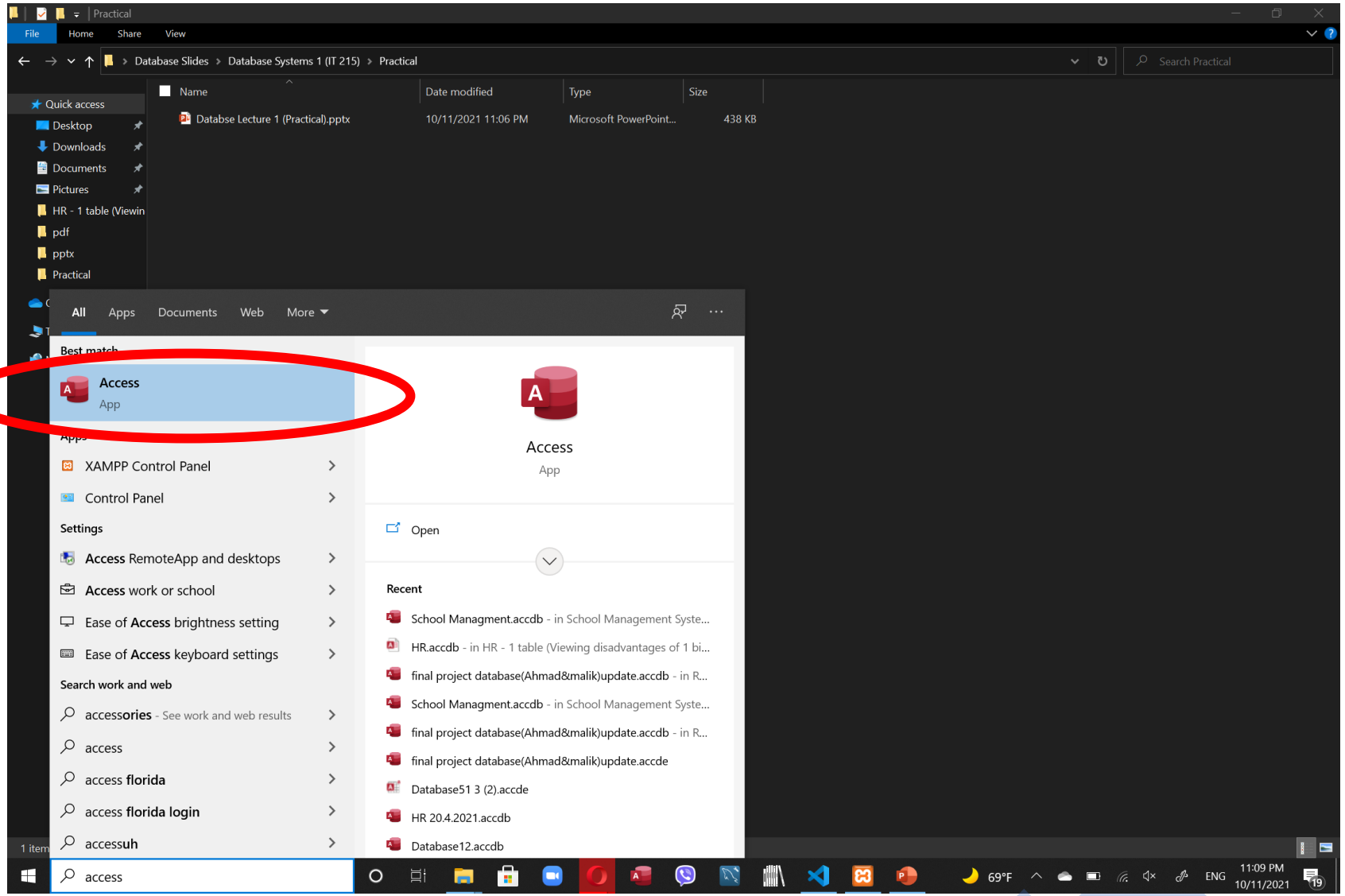
Table Tools
School Managment : Database- C:\Users\...\Database Slides\Docs\Database Systems 1\School Manag...
Wisam Abdulaziz
File
Home
Create
External Data
Database Tools
Help
Fields
Table
Tell me what you want to do
View
Short Text
Number
Currency
Date & Time
Yes/No
More Fields
Delete
Name & Caption
Default Value
Field Size
Modify Lookups
Modify Expression
Memo Settings
Data Type:
Required
Unique
Indexed
Validation
Views
Add & Delete
Properties
Field Validation
All Access Objects
Search...
Tables
Attendance
Grade
grade-teacher
Student
Subjects
Table1
Teachers
Queries
Grade Query
grades salary
Student attendance
Forms
Attendance
grade-teacher
Home
main
Student
Subjects form
Teachers Form
Reports
salaries report
Student attendance
subjects Report
Table1
(New)
Record: 1 of 1
No Filter
Search
Title Bar
Menu Bar
Toolbar
Sections Bar
Objects Bar
Database window
Status Bar

Start using MS Access

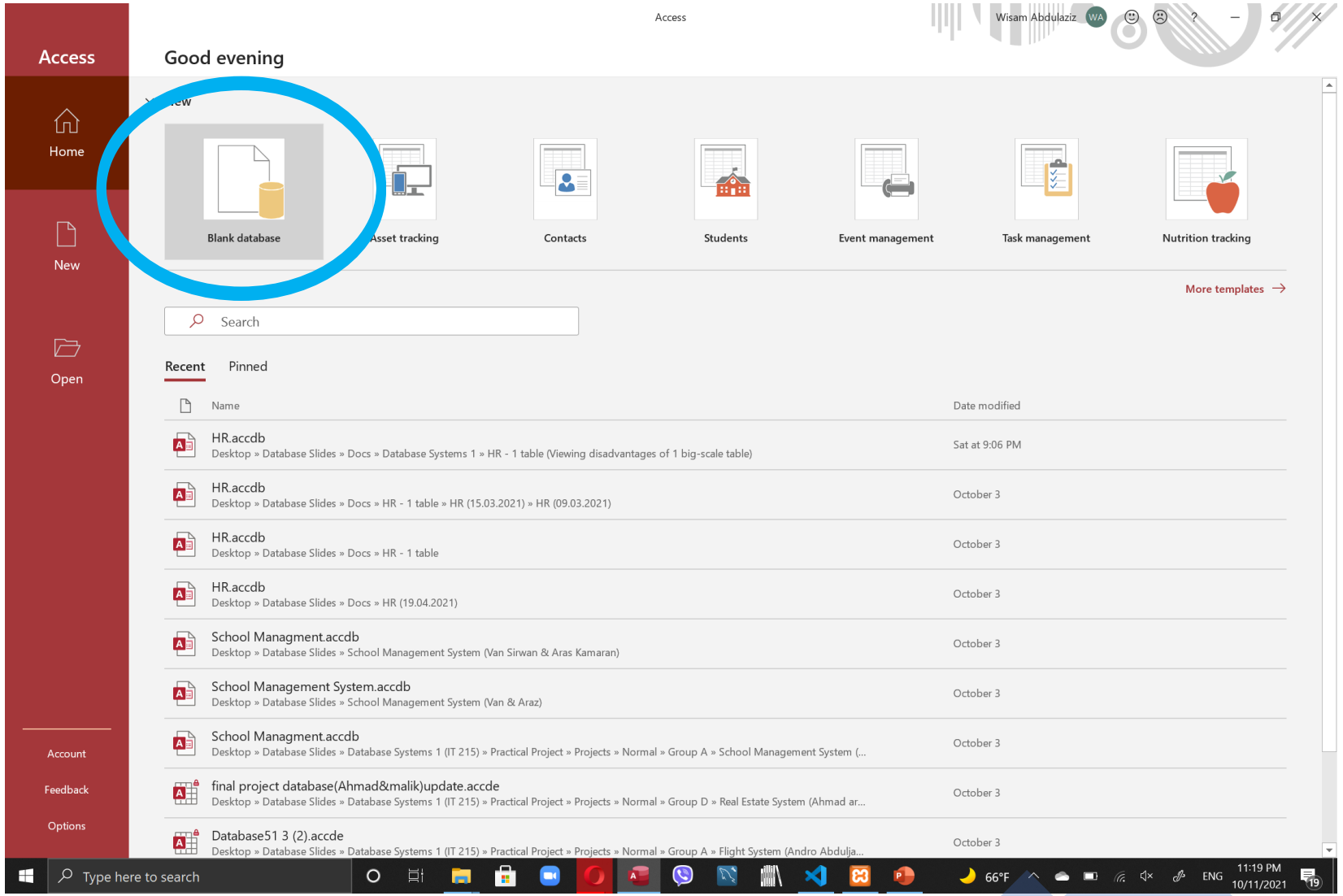
- As all other programs, there are some steps to get into and then use MS Access.

- In the next slides, we get through it step by step.

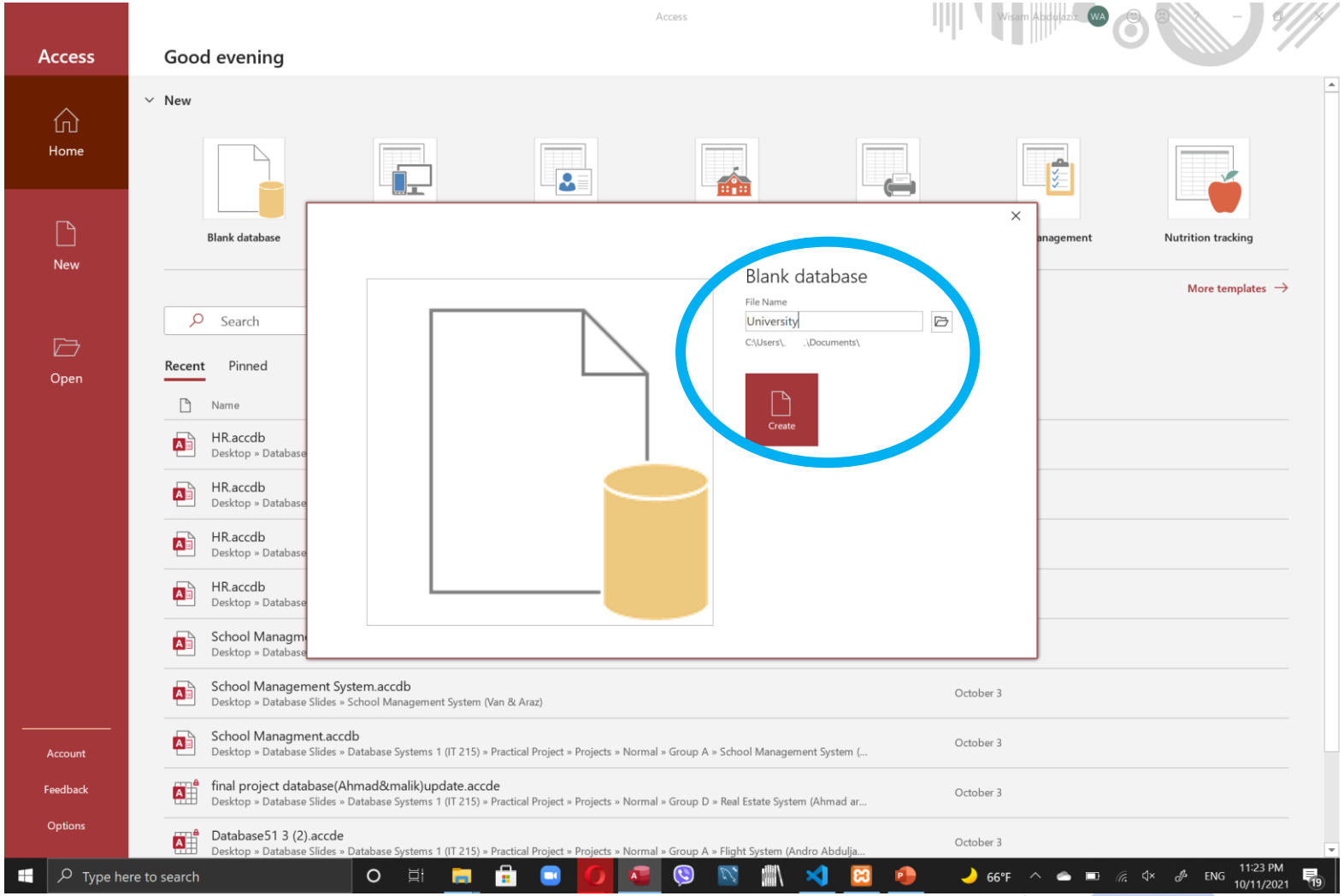
1. Windows > Open MS Access



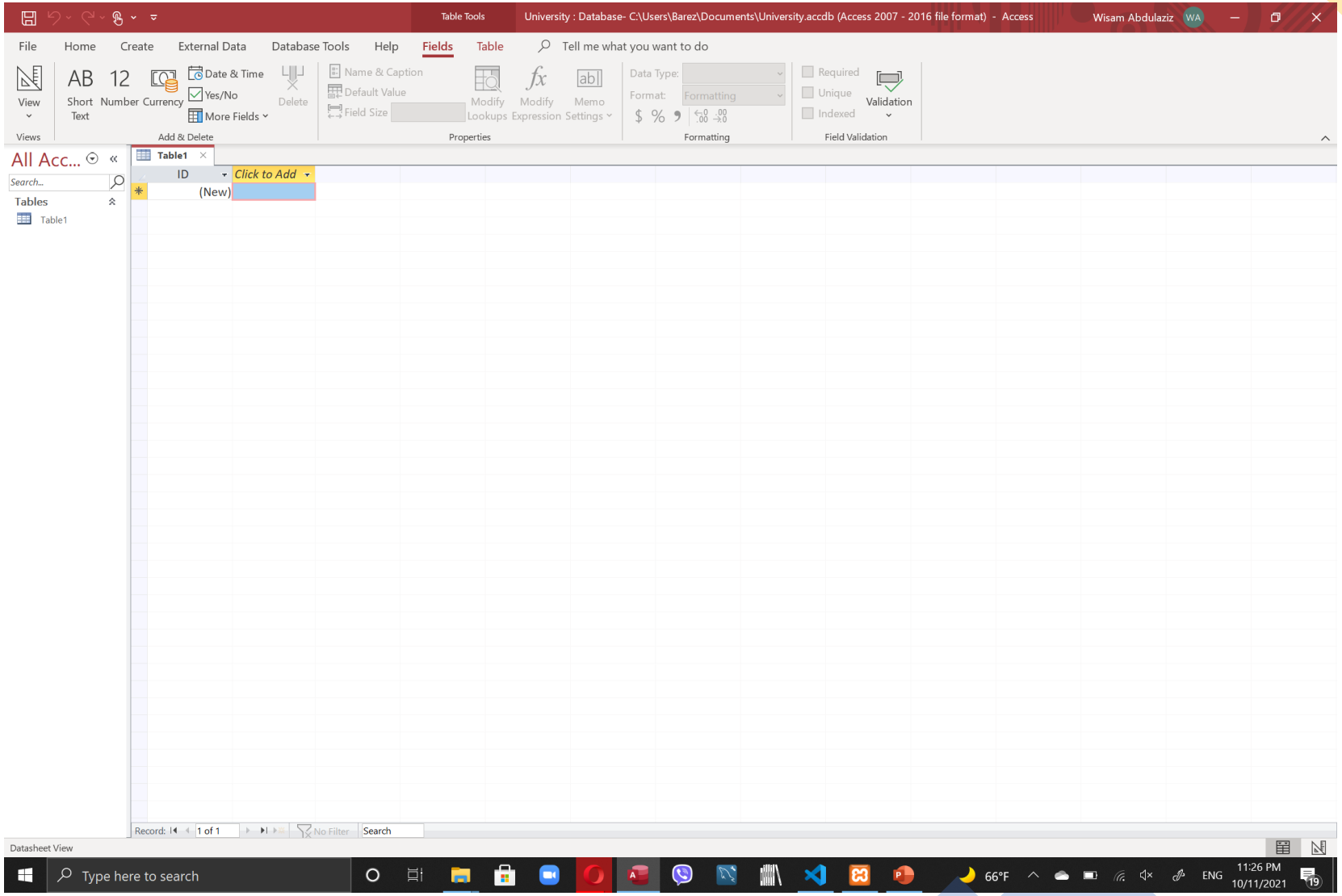
2. Select Blank Database



3. Specify a name and location of the Database, then click Create



4. Ready to work



Important Notes

- Name the table at the very first with a meaningful name.
- Do not use (leave) space for naming of fields (columns).

Data Types in MS Access

Data Type	Usage	Size
AutoNumber	Unique value generated by Access for each new record.	4 bytes (16 bytes for ReplicationID).
Short Text	Alphanumeric data (names, titles, etc.)	Up to 255 characters.
Number	Numeric data.	4 bytes.
Large Number	Numeric data.	8 bytes
Currency	4 decimal places of precision.	8 bytes.

Data Types in MS Access

Data Type	Usage	Size
Date/Time	Dates and times.	8 bytes.
Date/Time Extended	Dates and times.	42 bytes

Difference between Date/Time and Date/Time Extended

	Date/Time	Date/Time Extended
Minimum Value	100-01-01 00:00:00	0001-01-01 00:00:00
Maximum Value	9999-12-31 23:59:59.999	9999-12-31 23:59:59.9999999
Accuracy	0.001 seconds	1 nanosecond

Data Types in MS Access

Data Type	Usage	Size
Yes/No	Boolean (true/false) data; Access stores the numeric value zero (0) for false, and -1 for true.	1 byte.
Lookup Wizard	The Lookup Wizard entry in the Data Type column in Design view is not actually a data type. When you choose this entry, a wizard starts to help you define either a simple or complex lookup field. A simple lookup field uses the contents of another table or a value list to validate the contents of a single value per row. A complex lookup field allows you to store multiple values of the same data type in each row.	Dependent on the data type of the lookup field.

Data Types in MS Access

Data Type	Usage	Size
Rich Text	You can store rich, formatted text in an Access database by using a Long Text field and setting the field's TextFormat property to RichText.	From 1 to 4000 characters
Long Text	Large amounts of alphanumeric data: sentences and paragraphs.	Up to about 1 gigabyte (GB)
Attachment	You can attach files such as pictures, documents, spreadsheets, or charts.	Up to about 2 GB.

Data Types in MS Access

Data Type	Usage	Size
Hyperlink	A link address to a document or file on the Internet, on an intranet, on a local area network (LAN), or on your local computer	
Calculated	You can create an expression that uses data from one or more fields.	Dependent on the data type of the Result Type property.