

basic education

Department:
Basic Education
REPUBLIC OF SOUTH AFRICA

NATIONAL SENIOR CERTIFICATE

GRADE 12

COMPUTER APPLICATIONS TECHNOLOGY P1

NOVEMBER 2023

MARKS: 150

TIME: 3 hours

This question papers consists of 16 pages, an HTML tag sheet, an input mask character sheet, two pages for planning and a separate information sheet.

INSTRUCTIONS AND INFORMATION

- 1. Owing to the nature of this practical examination, it is important to note that, even if you complete the examination early, you will NOT be permitted to leave the examination room until all the administrative tasks associated with the examination have been finalised. During the examination, the standard examination rules regarding leaving the examination room apply.
- 2. If you are working on the network, or the data files have been preloaded on your system, you must follow the instructions provided by the invigilator/educator.
- 3. At the end of the examination, you must make sure that ALL your answer files are saved on the network/computer as explained to you by the invigilator/educator.
- 4. Make absolutely sure that all files can be read. Do NOT save unnecessary files/folders and do NOT hand in duplicate answer files/folders. Do NOT delete any original files that you did not work on.
- 5. The information sheet that has been provided with the question paper **MUST BE COMPLETED AFTER THE THREE-HOUR EXAMINATION SESSION**.
 Hand it to the invigilator at the end of the examination.
- 6. A copy of the master files will be available from the invigilator. Should there be any problems with a file, you may request another copy from the invigilator.
- 7. This question paper consists of SEVEN questions. Answer ALL the questions.
- 8. Read through each question before answering or solving the problem. Do NOT do more than is required by the question.
- 9. Ensure that you save each document using the file name given in the question paper. Save your work regularly as a precaution against possible power failures.
- 10. You may NOT use any resource material.
- 11. Accuracy will be taken into account.
- 12. Ensure that the regional settings are set to South Africa and date and time settings, number settings and currency settings are correctly set.
- 13. In all questions involving word processing, you should set the language to English (South Africa). The paper size is assumed to be A4 Portrait, unless instructed otherwise. Use centimetres as the unit of measurement.
- 14. Ensure that the Developer tab and Ruler are activated.
- 15. Ensure that the decimal symbol is set as a full stop ('.') and the list separator is set as a comma (',').

16. Formulae and/or functions must be used for ALL calculations in questions involving spreadsheets. Use absolute cell references only where necessary to ensure that formulae are correct when you copy them to other cells in a spreadsheet.

NOTE: All formulae and/or functions should be inserted in such a manner that the correct results will still be obtained even if changes are made to the existing data.

- 17. You may NOT use a word processing program such as Word to answer the HTML question.
- 18. Borders around images or screenshots in this question paper are intended for clarity. Do NOT insert borders unless you are instructed to do so.
- 19. The data files that you need to complete this question paper have been provided to you on the disk/CD/DVD/flash disk or on the disk space allocated to you. The files are provided in the form of a password-protected executable file.

Do the following:

• Double-click on the password-protected executable file:

CAT P1 Nov 2023 DATA.exe

- Click on the 'Extract' button.
- Click the 'Show Password' check box.
- Enter the following password: 1234cars
- Once extracted, verify the contents of the folder by opening one or more files.
- Once the contents of the files have been verified, rename the folder CAT P1 Nov 2023 DATA with your examination number.

The following list of files will be available in the folder:

• 1Top10	Word processing document		
1Toyota	Image		
• 2Tips	Word processing document		
3CarSales	Spreadsheet		
• 4Sales	Spreadsheet		
• 5Bus	Image		
• 5Card	Image		
• 5Shuttle	Database		
6_1Rover	Image		
• 6_1Win	HTML file		
6_2Father	Image		
6_2Logo	Image		
6_2Opening	HTML file		
• 7Bookings	Spreadsheet		
• 7New	Word processing document		

(2)

SCENARIO

Different types of transportation are used for moving people and goods from one point to another. Although many people use public transportation, cars have become more popular over the years.

QUESTION 1: WORD PROCESSING

Open the **1Top10** word processing document and insert your examination number in the header or footer.

The document contains information about the top ten car brand sales in South Africa during 2022.

- 1.1 Insert the Retrospect cover page as follows:
 - Document title: 'Popular Cars'
 - Remove the subtitle control. (3)
- 1.2 Find the heading that starts with 'These were South ...' and use font formatting to display the heading as shown below.



- 1.3 Find the text 'Question/Vraag 1.3' and replace it with the image **1Toyota**.

 Apply a 'Soft-Edge Rectangle' picture style to the image. (2)
- 1.4 Find and replace all occurrences of the word 'Hilux' so that it appears expanded by 1 pt with a scale of 150%. (3)

1.5 Find the table below the heading that starts with 'South Africa's 10 ...' and modify it to appear as the example below.

Car brand	Units sold	%Value
Ford	26 335	-15.40%
Haval	22 644	18.80%
Hyundai	36 047	7.70%
Isuzu	21 274	7.00%
Kia	22 766	12.90%
Nissan	30 487	1.00%
Renault	27 251	29.60%
Suzuki	47 178	71.00%
Toyota	132 035	12.20%
Volkswagen	en 69 801 -2.50%	
Minimum %Value		-15.40%

NOTE: The data for Volkswagen is <u>moved</u> into the table.

(5)

1.6 Find the chart/graph below the text that starts with 'The graph below ...' and insert the caption to display as 'Graph 2: Bestsellers'.

(2)

1.7 Find the letter 'D' below the heading 'Expectations for new ...' and format the letter as displayed in the example below.

D

espite the positive numbers for car manufacturers in 2022, the new car market's strong performance is decelerating due to repeating increases in interest rates since November 2021. NAAMSA and car retailer Combined Motor Holdings (CMH) expect this to burden car sales.

NOTE: The background colour of the letter D should display in a green shading. (4)

1.8 Find the heading that starts with 'The top 10 ...' and the table below the heading.

Change the settings to make sure that the heading and the table will always remain together.

1.9 Insert the file path in the header of the last page only. (2)

Save and close the **1Top10** document.

[24]

(1)

(3)

(1)

QUESTION 2: WORD PROCESSING

Open the **2Tips** word processing document and insert your examination number in the header or footer.

The document contains tips that can be followed when buying a vehicle.

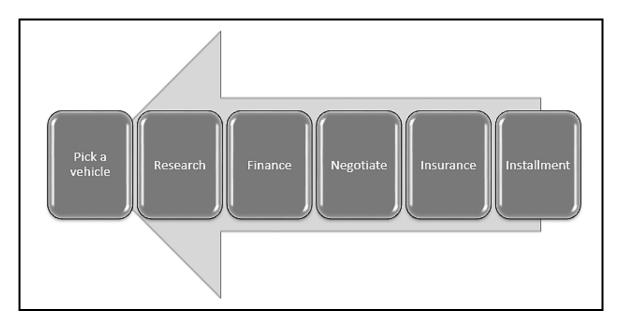
- 2.1 Change the margins of the document to narrow margins. (1)
- 2.2 Add a 3 pt border on the left and right side of the first page only. (3)
- 2.3 Create a link as follows:
 - Find the text 'Contact form' and create a bookmark called 'Contact'.
 - Insert a link on the text 'choosing' in the first paragraph to the 'Contact' bookmark.
- 2.4 Find the text that starts with '1. A new vehicle ...' and ends with '... start the research:'.
 - Change the numbered list to a bulleted list with the symbol (Webdings: Character code: 142). (2)
- 2.5 Edit the form controls below the heading 'Contact form' as follows:
 - 2.5.1 Find the text form field next to the text 'Surname' and apply a word processing feature to the text form field so that it appears as the rest of the form fields.
 - 2.5.2 Change the text form field next to the text 'Name' to display the data in capital letters. (1)
 - 2.5.3 Edit the text form field next to the 'Contact number' so that it can only accept the correct number of digits.

Examples: 0825893654 or 0359586321 (1)

- 2.5.4 Edit the text form field next to the text 'Preferred time to call' so that a user can insert a specific time of day in the format: h:mm am/pm (2)
- 2.6 Insert a shape to appear as in the example below.



2.7 Find the SmartArt on the last page and format the SmartArt to appear as shown in the example below.



NOTE: A '3D Cartoon' style was applied.

(4)

Save and close the **2Tips** document.

[21]

(3)

(2)

(2)

QUESTION 3: SPREADSHEET

NOTE:

- Use formulae and/or functions for ALL calculations in the spreadsheet.
- Use absolute cell references ONLY where necessary to ensure that formulae are correct when you copy it to other cells in a spreadsheet.
- Insert formulae and/or functions in such a manner that the correct results will still be obtained even if values are changed in the existing data.
- Should you need to use building blocks, use the space allocated for this in the spreadsheet data file.

Open the **3CarSales** spreadsheet which contains the number of cars sold by the salespersons for the period October 2022 to September 2023.

Work in the **Total** worksheet.

- 3.1 Edit the heading in **row 1** as follows:
 - Merge and centre cells A1:J1.
 - Apply a 'Distributed (Indent)' horizontal text alignment with an indent of 13.
- 3.2 The total number of cars sold by each salesperson for the period 2022/2023 is stored in **row 7**.
 - Insert a function in **cell E3** to determine the second lowest total number of cars sold by a salesperson for the period 2022/2023.
- Insert a function in **cell E4** to determine the number of months in which the total monthly sales of cars were fewer than 15.
- 3.4 Apply a spreadsheet feature to **cells C9:I20** to display the percentage values of 0 to 50 in a two-colour scale format style. Change the colour of the minimum value to blue. (4)
- Insert a lookup function in **cell F23** to display the name of the salesperson who sold the most cars for the period 2022/2023. (6)

Save and close the **3CarSales** spreadsheet. [17]

(1)

(4)

QUESTION 4: SPREADSHEET

NOTE:

- Use formulae and/or functions for ALL calculations in the spreadsheet.
- Use absolute cell references ONLY where necessary to ensure that formulae are correct when you copy it to other cells in a spreadsheet.
- Insert formulae and/or functions in such a manner that the correct results will still be obtained even if values are changed in the existing data.
- Should you need to use building blocks, use the space allocated for this in the spreadsheet data file.

Open the **4Sales** spreadsheet which contains information on cars bought in September 2023 at Sam's Dealership.

NOTE: A dialogue box will display when opening the file. Click on OK.

Work in the Sales worksheet.

- 4.1 Change the format in **column H** to an appropriate data type and make sure that all the information in the column is visible. (2)
- 4.2 The function in **cell C3** was an attempt to determine if the total interest (**cell E3**) is 8% of the total car prices (**column E**).

However, the function displays an incorrect result.

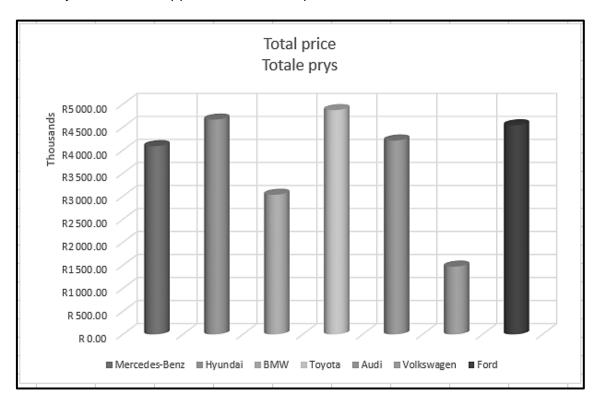
Correct the formula in **cell C3** to display the correct result.

- 4.3 Insert a function in **cell C5** to calculate the total price (**column E**) for all the **Hyundai i-**models. (6)
- 4.4 Modify the function in **cell A11** to only display the initial(s) of the customer (**column B**).
- 4.5 The total cost for a car is calculated by adding the price and the interest. However, if a buyer wants extra accessories (**column G**), an additional 5% is added to the total cost.

Insert a formula/function in **cell H10** to calculate the final total cost for Basson. (4)

Work in the **Chart** worksheet.

4.6 Modify the chart to appear as the example below.



NOTE: The column colours have been set to vary by point.

(6)

Save and close the **4Sales** spreadsheet.

[23]

QUESTION 5: DATABASE

The database contains information on the drivers and clients of a shuttle company.

Open the **5Shuttle** database.

- 5.1 Open the **tbl5_1** table in Design View.
 - 5.1.1 Change the properties of the *Name* field to make sure that a name is always entered. (1)
 - 5.1.2 Edit the properties of the *StartDate* field to display in the format:

 dd-mmm-yy (2)
 - 5.1.3 A driver's licence number must be entered in a specific format.

Change the properties of the *LicenceNo* field so that a user will enter data as follows:

- SIX compulsory numbers; followed by
- THREE capital letters; followed by
- ONE optional number

Examples: 435698XKJ8 or 963214PJH (4)

- 5.1.4 Change the properties of the *Rating* field to ONLY accept ratings from 1 to 5. No default value should appear in this field. (2)
- 5.1.5 Insert a new field called *LicenceCard* above the *LicenceNo* field.

Insert the **5Card** image, in Datasheet View, for the driver Mark Lopez. (4)

Save and close the **tbl5_1** table.

- 5.2 Open the **frm5_2** form, based on the **Pre-bookings** table, in Design View and edit as follows:
 - Insert the **5Bus** image in the form header as a logo.
 - Change the properties of the Reason field to a combo box to display the options 'Business' and 'Personal'.

Save and close the **frm5_2** form. (5)

5.3 Create a query called **qry5_3** based on the **Pre-bookings** table as follows:

Display only the name, surname and contact number of the following clients:

- Business clients who travel more than 30 km
- Any clients who travel 10 km or less

Save and close the qry5_3 query.

(5)

Open the **qry5_4** query, based on the **Pre-bookings** table, in Design View.

Modify the query to display the clients who will use the shuttle services to depart in December.

Save and close the **qry5_4** query.

(3)

5.5 Open the **qry5_5** query, based on the **Pre-bookings** table, in Design View.

Insert a new field *Total* to calculate the total travel cost for a client for a <u>return</u> trip. The client is charged R6,25 per kilometre travelled.

Save and close the **qry5_5** query.

(4)

- Open the **rpt5_6** report, based on the **Pre-bookings** table, in Design View and modify as follows:
 - Insert a function in the group footer to indicate the total clients per *Reason*.
 - Change the page orientation to landscape.
 - Export the report as a PDF document called **5Pre-bookings** to your data folder.

Save and close the **rpt5_6** report.

(5)

Save and close the **5Shuttle** database.

[35]

QUESTION 6: WEB DESIGN (HTML)

NOTE:

- You may NOT use a word processing program such as Word to answer the HTML questions.
- An HTML tag sheet has been attached for reference.
- All files needed to complete this question can be found in the data folder.

A web page was created for a promotional competition to win a car from Sam's Dealership.

6.1 Open the incomplete **6_1Win** file in a web browser and also in a text/HTML editor.

Your final web page should look like the example below.



Ts and Cs

- a. This promotional competition is organised by Sam's Dealership.
- b. No director, subscriber, partner, employee, agent of, or consultant to the Promoter or any other person who directly or indirectly controls or is controlled by the Promoter, their advertising agencies, or their spouses, life partners, parents, children, brothers, sisters, business partners or associates, may enter this promotional competition.
- c. All participants must be resident in South Africa and be over the age of 18 years.
- d. By entering the competition you agree and understand that there is no guarantee that you will win a prize.
- e. There will be one winner only.
- f. Prizes are not transferable, may not be deferred or be exchanged for cash or otherwise.
- g. If any taxes, levies, duties or any charges whatsoever are levied on a prize by any competent authority, the winner will be liable for these and the prize value will not be increased to compensate for such charges.
- h. The winner will be randomly drawn at Head Office.
- The decision of the judges will be final and no correspondence regarding this will be entered into.

NOTE:

- Use the example above as a guide when answering this question.
- Question numbers appear as comments in the coding to indicate where you should insert the answer(s). DO NOT delete these comments.

6.1.1	Insert an attribute to the body tag so that the web page colour displays light blue.	(2)
6.1.2	Modify the image tag attributes so that the images appear as shown in the example on the previous page.	(2)
6.1.3	Change the HTML code so that the 'Home' text displays in the table as shown in the example on the previous page.	(1)
6.1.4	Insert a tag to the table heading 'Ts and Cs' so that it will link to the 6_1Win web page.	(2)
6.1.5	Modify the HTML code to display the list as shown in the example on the previous page.	(2)

Save and close the 6_1Win file.

Open the incomplete **6_20pening** web page in a web browser and also in a text/HTML editor.

Complete the web page to resemble the example below.



Save and close the 6_20pening file.

(5)

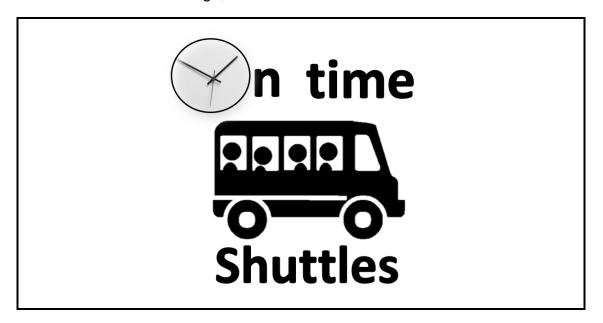
ONE mark will be allocated for closing tags and correct nesting in both the files.

(1) **[15]**

QUESTION 7: GENERAL

Open the **7New** word processing document.

7.1 The shuttle company is upgrading their logo. Use WordArt and the images in the file to create a new logo, as shown below.



NOTE:

- The final logo should be one image.
- Save the final logo as an image called **7NewLogo**.

Save and close the **7New** document.

- 7.2 Open the **7Bookings** spreadsheet.
 - 7.2.1 Shuttle drivers need to be notified one and a half hours before a client's departure time.

Insert a function in **cell D8** to calculate the time a driver should be notified.

- 7.2.2 Insert a formula in **column G** to calculate the number of days between the departure and return dates for all clients.
- 7.2.3 Edit the worksheet as follows:
 - Change the settings to make sure that when the entire worksheet is printed, the information in columns A to G will appear on the first page.
 - Edit the print options to include the row and column headings. (2)

Save and close the **7Bookings** spreadsheet.

[15]

(5)

(5)

(3)

TOTAL: 150

HTML TAG SHEET

Basic Tags			
Tag	Description		
<body></body>	Defines the body of the web page		
<body< td=""><td>Sets the background colour of</td></body<>	Sets the background colour of		
bgcolor="pink">	the web page		
<body text="black"></body>	Sets the colour of the body text		
<head></head>	Contains information about the web page		
<html></html>	Creates an HTML document – starts and ends a web page		
<title></title>	Defines a title for the web page		
 br/>	Inserts a line break		
	Comment		
Text Tags			
Tag	Description		
<h1></h1>	Creates the largest heading		
<h6></h6>	Creates the smallest heading		
	Creates bold text		
<i><i></i></i>	Creates italic text		
<u></u>	Creates underlined text		
	Sets size of font, from "1" to "7"		
			
	Sets font colour		
<font face="Times New
Roman">	Sets font type		
Links Tags			
Tag	Description		
	Creates a hyperlink		
<img< td=""><td></td></img<>			
src="name">	Creates an image link		
	Creates a target location in the document		
	Links to a target location created somewhere else in the document		
<a href="<br">"mailto:#NAME">	Links to an e-mail address		
Formatting Tags			
Tag	Description		
	Creates a new paragraph		
<pre></pre>	Aligns a paragraph to the "left" (default), can also be "right" or "center"		
<center></center>	Centre text, a table of an image horizontally		
	Creates a numbered list		
	Oroatoo a mamboroa not		
<ol ,"a",<="" td="" type="A"><td>Defines the type of numbering used</td>	Defines the type of numbering used		
 type="A","a", "I","i","1">	Defines the type of numbering used		
<ol ,"a",<="" td="" type="A"><td>Defines the type of numbering</td>	Defines the type of numbering		

	SHEET				
Formatting Tags continued					
Tag	Description				
	Inserted before each list item, and adds a number or symbol depending on the type of list selected				
	Adds an image				
<img <br="" src="name"/> align="left">	Aligns an image: can be "right", "bottom", "top"				
<pre></pre>	Aligns an image in the "center", can also be "middle"				
<img <br="" src="name"/> border="1">	Sets the size of the border around an image				
<img <br="" src="name"/> width="200" height ="200">	Sets the height and width of an image				
<img <br="" src="name"/> alt="alternative text">	Displays alternative text when the mouse hovers over the image or when the image is not found				
<hr/> <hr/> <hr size="3"/>	Inserts a horizontal line Sets size (height) of a line				
<pre><hr width="80%"/></pre>	Sets the width of a line, in percentage or absolute value				
<hr color="ff0000"/>	Sets the colour of the line				
Table Tags					
Tag	Description				
	Creates a table				
	Creates a row in a table				
	Creates a cell in a table				
	Creates a table header (a cell with bold, centred text)				
	Sets the width of the table				
	Sets the width of the border around the table cells				
	Sets the space between the table cells				
	Sets the space between a cell border and its contents				
	Sets the alignment for cell(s) ("left", can also be "center" or "right")				
	Sets the vertical alignment for cell(s) ("top", can also be "middle" or "bottom")				
	Sets the number of columns a cell should span				
	Sets the number of rows a cell				

INPUT MASK CHARACTER SHEET

CHARACTER	DESCRIPTION
0	Digit (0 to 9, entry required, plus [+] and minus [-] signs not allowed)
9	Digit or space (entry not required, plus [+] and minus [-] signs not allowed)
#	Digit or space (entry not required; spaces are displayed as blanks while in Edit mode, but blanks are removed when data is saved; plus [+] and minus [–] signs allowed)
L	Letter (A to Z, entry required)
?	Letter (A to Z, entry optional)
Α	Letter or digit (entry required)
а	Letter or digit (entry optional)
&	Any character or a space (entry required)
С	Any character or a space (entry optional)
.,:;-/	Decimal placeholder and thousand, date and time separators (The actual character used depends on the settings in the Regional Settings Properties dialog box in the Windows Control Panel.)
<	Causes all characters to be converted to lower case
>	Causes all characters to be converted to upper case
!	Causes the input mask to display from right to left, rather than from left to right. Characters typed into the mask always fill it from left to right. You can include the exclamation mark anywhere in the input mask.
\	Causes the character that follows to be displayed as the literal character (e.g. \A is displayed as just A)

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YOU MAY USE THIS PAGE FOR ANY PLANNING PURPOSES.

Examination sticker

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COMPUTER APPLICATIONS TECHNOLOGY P1 – NOVEMBER 2023

INFORMATION SHEET (t	to be completed by the	candidate <u>AFTER</u> the 3	-hour session)
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CENTRE NUMBER	
EXAMINATION NUMBER_	
WORKSTATION NUMBER	

SUITE USED (Mark appropriate box with a cross (X))	Microsoft Office 2016	Microsoft Office 2019	Microsoft Office 2021	Office 365	
WEB BROWSER USED (Mark appropriate box with a cross (X))	Mozilla	Google	Internet	Microsoft	Other
	Firefox	Chrome	Explorer	Edge	(Specify)

FOLDER NAME

Candidate must enter the file name(s) used for each answer. Tick if saved and/or attempted.

Question Number	File Name	Saved (✓)	Attempted ()	Maximum Mark	Mark Achieved	Marker Initial/ Code
1	1Top10			24		
2	2Tips			21		
3	3CarSales			17		
4	4Sales			23		
5	5Shuttle			35		
6	6_1Win			15		
	6_2Opening					
7	7Bookings			15		
	7New					
	7NewLogo					
TOTAL				150		

Comment:	(for office/marker use only)