

**Marking Scheme**  
**Information & Communication Technology 1/11**  
**Grade 10**  
**2<sup>nd</sup> Term – 2023**


**Part 1**

1	3	21	2
2	1	22	2
3	4	23	4
4	3	24	4
5	3	25	4
6	2	26	4
7	2	27	2
8	4	28	1
9	1	29	4
10	2	30	4
11	3	31	1
12	4	32	3
13	2	33	2
14	1	34	3
15	3	35	4
16	1	36	1
17	1	37	4
18	2	38	2
19	2	39	2
20	2	40	4

**Part 11**

(1)		20 Marks	
i	22F <sub>16</sub> - 0010 0010 1111 - 001 000 101 111 - 1 0 5 7 - 1057 <sub>8//</sub>	2 Marks	
ii	ISBN	It is seen on the back page of some books that you buy or borrow from the library.	2 Marks  (.5*4)
	Fingerprint reader	Used in institutes to record attendance.	
	ATM	Used to getting account related information in the banking system.	
	Bar code	An image you may see on the packaging of some products you buy.	
iii	a. Output device - Soft copy, Hard copy and Sound. b. Secondary memory - Magnetic media, Optical media, Solid state device. c. Primary memory - access memory, Read only memory, Cache memory. d. Pointing device - Joy stick, Light pen, Touch pad.	2 Marks  (.5*4)	

iv	<ul style="list-style-type: none"> <li>• Modem</li> <li>• Network card.</li> <li>• Touch screen.</li> <li>• Headset –(with microphone and speaker)</li> <li>• FAX machine ( scanner and the printer are there )</li> <li>• Audio Cards / Sound Card.</li> </ul>	2 Marks																														
v	<p>i. <math>F = A+B . ( A.B)'</math></p> <p>ii.</p> <table border="1" data-bbox="233 595 684 819"> <thead> <tr> <th>A</th> <th>B</th> <th>A+B</th> <th>A.B</th> <th>( A.B)'</th> <th>A+B . ( A.B)'</th> </tr> </thead> <tbody> <tr> <td>0</td> <td>0</td> <td>0</td> <td>0</td> <td>1</td> <td>0</td> </tr> <tr> <td>0</td> <td>1</td> <td>1</td> <td>0</td> <td>1</td> <td>1</td> </tr> <tr> <td>1</td> <td>0</td> <td>1</td> <td>0</td> <td>1</td> <td>1</td> </tr> <tr> <td>1</td> <td>1</td> <td>1</td> <td>1</td> <td>0</td> <td>0</td> </tr> </tbody> </table>	A	B	A+B	A.B	( A.B)'	A+B . ( A.B)'	0	0	0	0	1	0	0	1	1	0	1	1	1	0	1	0	1	1	1	1	1	1	0	0	2 Marks  (1 Mark)  (1 Mark)
A	B	A+B	A.B	( A.B)'	A+B . ( A.B)'																											
0	0	0	0	1	0																											
0	1	1	0	1	1																											
1	0	1	0	1	1																											
1	1	1	1	0	0																											
vi	<p>i. System software</p> <p>ii. Application Software</p>	2 Marks																														
vii	<p>Single User ,</p> <p>Multi user</p> <p>Multi tasking</p> <p>Real-time</p>	2  (.5*4)																														
viii	<table border="1" data-bbox="320 1167 600 1438"> <tr> <td>3</td> <td>A</td> </tr> <tr> <td>4</td> <td>B</td> </tr> <tr> <td>1</td> <td>C</td> </tr> <tr> <td>2</td> <td>D</td> </tr> </table>	3	A	4	B	1	C	2	D	2 Marks  (.5*4)																						
3	A																															
4	B																															
1	C																															
2	D																															
ix	<table border="1" data-bbox="269 1480 429 1630"> <tr> <td>A</td> <td>2</td> </tr> <tr> <td>B</td> <td>4</td> </tr> <tr> <td>C</td> <td>1</td> </tr> <tr> <td>D</td> <td>3</td> </tr> </table>	A	2	B	4	C	1	D	3	2 Marks  (.5*4)																						
A	2																															
B	4																															
C	1																															
D	3																															
x	<p>1). Left align</p> <p>2). center</p> <p>3). Right align</p> <p>4). justify</p>	2 Marks  (.5*4)																														

(2)		10 Marks																																				
i	<ol style="list-style-type: none"> <li>1. simplex</li> <li>2. Half duplex</li> <li>3. Full duplex</li> </ol>	3 Marks																																				
ii	<ol style="list-style-type: none"> <li>1. Local area network</li> <li>2. Metropolitan area Network</li> <li>3. Wide area Network</li> </ol>	3 Marks																																				
iii	<ul style="list-style-type: none"> <li>• Mesh Topology</li> </ul> 	1 Mark 1 Mark																																				
iv	<p>Advantages: -</p> <ol style="list-style-type: none"> <li>1. Data and information can be shared between computers.</li> <li>2. Less storage space</li> <li>3. Ability to share resources</li> <li>4. Ability to control central software</li> <li>5 Ability to connect anywhere and at any time</li> <li>6. Security</li> <li>7. Electronic mail</li> </ol> <p>Disadvantages:-</p> <ol style="list-style-type: none"> <li>1. Possible security issues.</li> <li>2. Breakdown of network</li> <li>3. Virus</li> <li>4. Computer breakdowns</li> <li>5 Training requirements</li> </ol>	1 Mark (.5*2)  1 Mark (.5*2)																																				
(3)		10 Marks																																				
i	Main memory / primary memory	2 Marks																																				
ii	By control unit	2 Marks																																				
iii	Holds data instruction temporally	4 Marks																																				
iv	printer, Monitor, Multimedia projector, head set, speaker	2 Marks																																				
(4)																																						
i	Base value - 10 . Weighting factors $10^0, 10^1, 10^2, \dots$ Digits ( 0, 1, 2, 3, 4, 5, 6, 7, 8, 9 )	3 Marks																																				
ii	A – 10 , B – 11 , C – 12 , D – 13, E – 14, F – 15	2 Marks																																				
iii	<table border="1" data-bbox="175 1635 933 1713"> <tr> <td><b>Octal</b></td> <td>0</td> <td>1</td> <td>2</td> <td>3</td> <td>4</td> <td>5</td> <td>6</td> <td>7</td> </tr> <tr> <td><b>Binary</b></td> <td>000</td> <td>001</td> <td>010</td> <td>011</td> <td>100</td> <td>101</td> <td>110</td> <td>111</td> </tr> </table>	<b>Octal</b>	0	1	2	3	4	5	6	7	<b>Binary</b>	000	001	010	011	100	101	110	111	2 Marks																		
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Hexa decima;	0	1	2	3	4	5	6	7																														
binary	0000	0001	0010	0011	0100	0101	0110	0111																														
Hexa decimal	8	9	A	B	C	D	E	F																														
binary	1000	1001	1010	1011	1100	1101	1110	1111																														
(5)		10 Marks																																				

i	NAND , NOR	2 Marks
ii	NOT	1 Mark
iii	NAND - AND + NOT	3 Marks
iv	Y = 0	2 Marks
v	1 , 1	2 Marks

6)		10 Marks												
i	<table border="1"> <thead> <tr> <th><b>Licenced</b></th> <th><b>Free and open source</b></th> </tr> </thead> <tbody> <tr> <td>Microsoft Windows</td> <td>Ubuntu</td> </tr> <tr> <td>Windows 11</td> <td>Android</td> </tr> <tr> <td>Windos 10</td> <td>Hanthane Linux</td> </tr> <tr> <td>Mac</td> <td>Isuru Linux</td> </tr> <tr> <td></td> <td></td> </tr> </tbody> </table>	<b>Licenced</b>	<b>Free and open source</b>	Microsoft Windows	Ubuntu	Windows 11	Android	Windos 10	Hanthane Linux	Mac	Isuru Linux			4 Marks
<b>Licenced</b>	<b>Free and open source</b>													
Microsoft Windows	Ubuntu													
Windows 11	Android													
Windos 10	Hanthane Linux													
Mac	Isuru Linux													
ii	Real time	2 Marks												
iii	Disk formatting	2 Marks												
iv	To get backups	2 Marks												
(7)		10												
i	spelling and Grammer	2 Marks												
ii	thesaurus	2 Marks												
iii	find n replace	2 Marks												
iv	print preview	2 Marks												
v	Ctrl+S	2 Marks												