

Wednesday 13 June 2018 – Morning

AS GCE MATHEMATICS (MEI)

4771/01 Decision Mathematics 1

PRINTED ANSWER BOOK

Candidates answer on this Printed Answer Book.

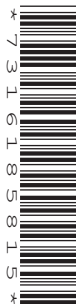
OCR supplied materials:

- Question Paper 4771/01 (inserted)
- MEI Examination Formulae and Tables (MF2)

Other materials required:

- Scientific or graphical calculator

Duration: 1 hour 30 minutes



Candidate forename		Candidate surname	
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Centre number						Candidate number				
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INSTRUCTIONS TO CANDIDATES

These instructions are the same on the Printed Answer Book and the Question Paper.

- The Question Paper will be found inside the Printed Answer Book.
- Write your name, centre number and candidate number in the spaces provided on the Printed Answer Book. Please write clearly and in capital letters.
- **Write your answer to each question in the space provided in the Printed Answer Book.** Additional paper may be used if necessary but you must clearly show your candidate number, centre number and question number(s).
- Use black ink. HB pencil may be used for graphs and diagrams only.
- Read each question carefully. Make sure you know what you have to do before starting your answer.
- Answer **all** the questions.
- Do **not** write in the barcodes.
- You are permitted to use a scientific or graphical calculator in this paper.
- Final answers should be given to a degree of accuracy appropriate to the context.

INFORMATION FOR CANDIDATES

This information is the same on the Printed Answer Book and the Question Paper.

- The number of marks is given in brackets [] at the end of each question or part question on the Question Paper.
- You are advised that an answer may receive **no marks** unless you show sufficient detail of the working to indicate that a correct method is being used.
- The total number of marks for this paper is **72**.
- The Printed Answer Book consists of **12** pages. The Question Paper consists of **8** pages. Any blank pages are indicated.

1 (i)	
1 (ii)	
1 (iii)	
1 (iv)	
1 (v)	

2 (a)(i)	
2 (a)(ii)	
2 (b)(i)	
2 (b)(ii)	

3 (a)(i)	
3 (a)(ii)	<p>Number of throws to get a 6.</p> <p>Run 1 5 3 4 9 8 7 1 3 2 3 7 2 3 2 7 2 6 4 4 0 Number of throws:</p> <p>Run 2 6 0 3 5 8 4 6 5 2 8 7 2 1 4 9 7 4 4 6 2 Number of throws:</p> <p>Run 3 1 7 2 0 5 0 7 4 5 0 7 3 1 1 5 9 6 2 8 1 Number of throws:</p> <p>Run 4 0 7 5 2 0 3 7 8 0 9 9 6 1 0 1 7 4 1 2 6 Number of throws:</p> <p>Run 5 0 3 0 8 3 0 3 9 4 8 6 4 1 0 6 2 5 3 7 1 Number of throws:</p> <p>Run 6 3 7 1 1 4 9 5 8 5 5 5 2 9 9 0 0 1 6 5 8 Number of throws:</p> <p>Run 7 5 6 2 4 7 0 6 8 4 7 3 2 9 6 2 6 9 7 1 0 Number of throws:</p> <p style="text-align: right;">(answer space continued on next page)</p>

3(a)(ii)	<p>(continued)</p> <p>Run 8</p> <p>5 3 0 9 4 7 0 2 8 3 7 7 4 1 6 5 9 7 2 1</p> <p>Number of throws:</p> <p>Run 9</p> <p>8 3 6 8 1 0 7 9 6 6 7 2 6 9 5 7 8 9 5 4</p> <p>Number of throws:</p> <p>Run 10</p> <p>3 5 2 6 1 1 2 0 4 5 2 1 9 5 6 2 8 5 0 7</p> <p>Number of throws:</p>
3(a)(iii)	
3(b)(i)	
3(b)(ii)	
3(b)(iii)	

4 (i)&(ii)	
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4(iii) One square represents 5 minutes

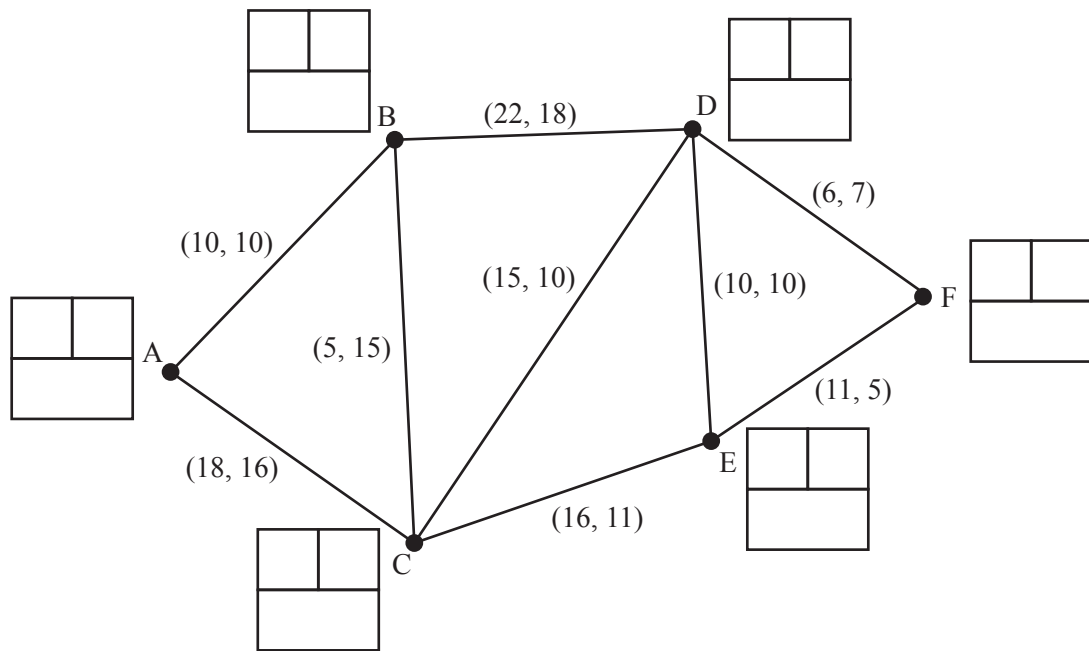
A																			
B																			
C																			
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4(iv)

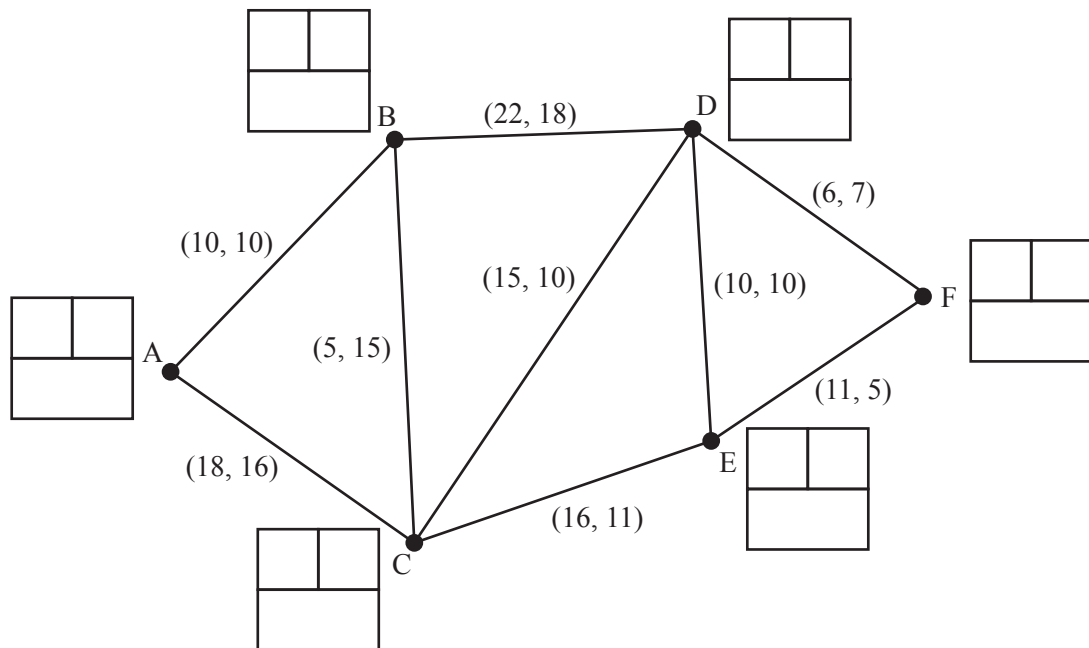
Spare grid for part (iii)

A																			
B																			
C																			
D																			
E																			
F																			
G																			
H																			
I																			
J																			
K																			

5(i)

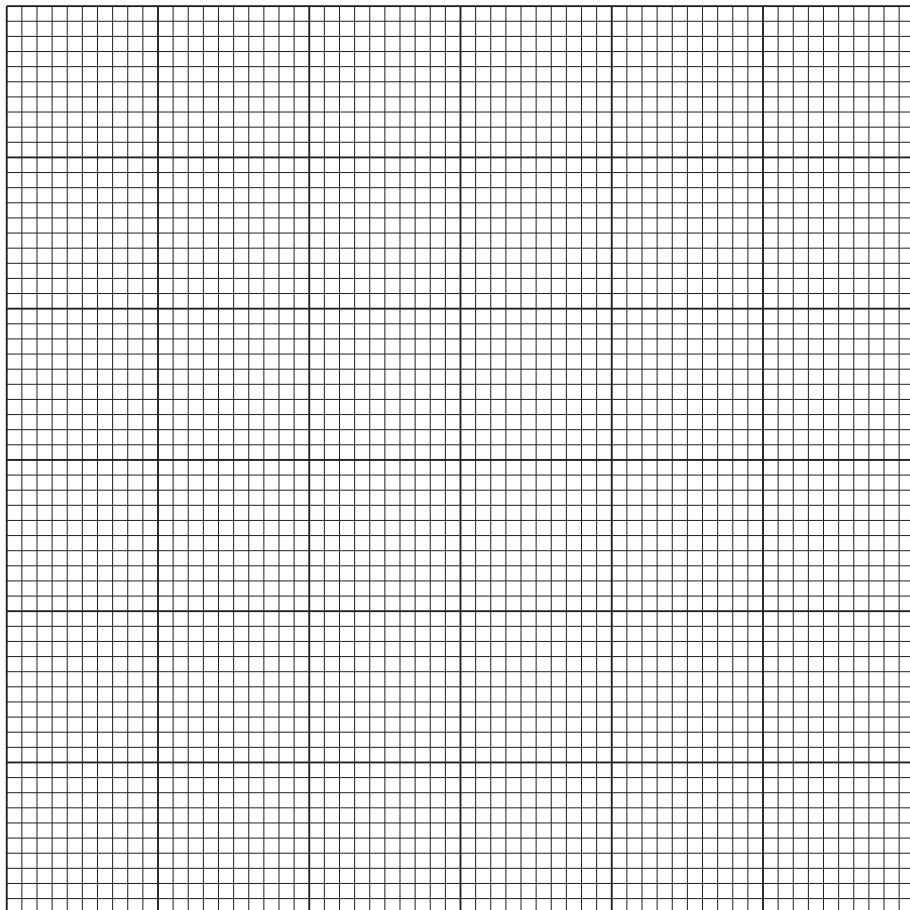


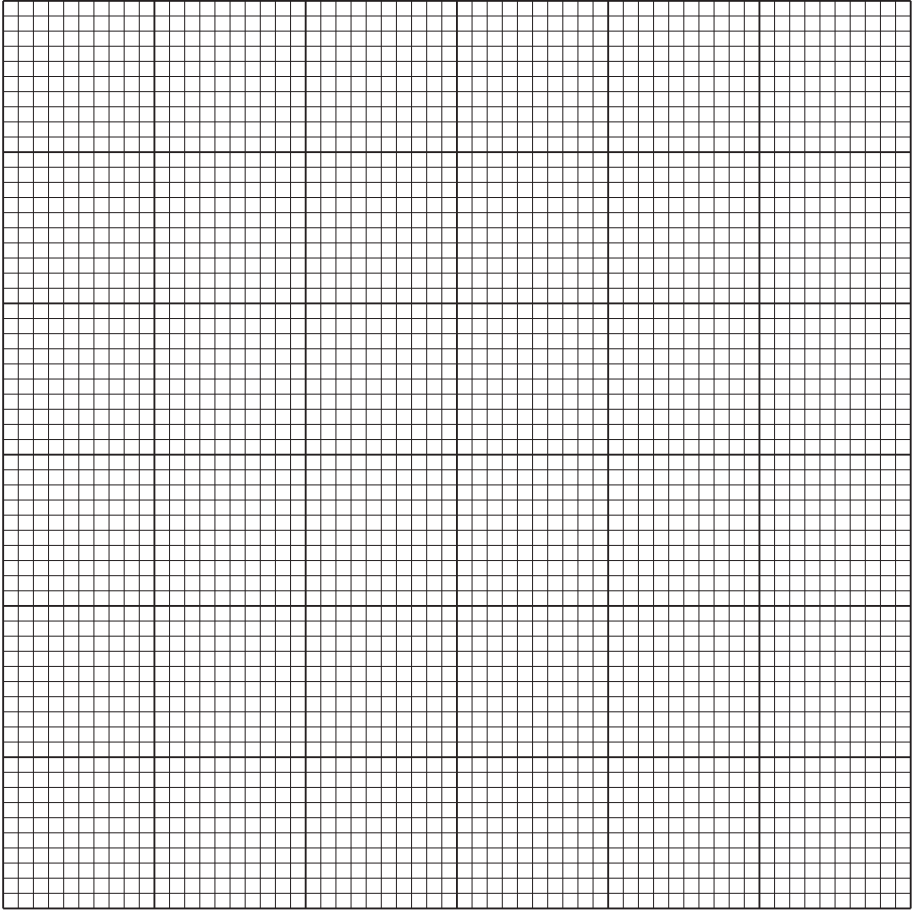
5(ii)



5(iii)	
5(iv)	
5(v)	
5(vi)	
5(vii)	

6(i)

6(ii)

6(iii)	
6(iv)	
	<p>Spare grid for part (ii)</p> 

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