

**Paper Reference 8FM0–23**  
**Pearson Edexcel**  
**Level 3 GCE**

**Further Mathematics**  
**Advanced Subsidiary**  
**Further Mathematics options**  
**23: Further Statistics 1**  
**(Part of options B, E, F and G)**

**Thursday 16 May 2019 – Afternoon**

# **Data Book**

**In the boxes below, write your name, centre number and candidate number.**

<b>Surname</b>					
<b>Other names</b>					
<b>Centre Number</b>					
<b>Candidate Number</b>					

## **INSTRUCTIONS**

**There may be spare copies of some data sheets in case you need them.**

**THIS DATA BOOK MUST BE RETURNED WITH  
THE ANSWER BOOK AT THE END OF THE  
EXAMINATION.**

## **Contents**

### **Page**

<b>4</b>	<b>Question 1</b>
<b>5</b>	<b>Question 2</b>
<b>6</b>	<b>Question 4</b>

Question 1

Activity Age a years	Activity			
	Badminton	Bowls	Snooker	
a < 20	9	3	3	
20 ≤ a < 40	10	10	14	
40 ≤ a < 50	16	15	5	
50 ≤ a < 60	15	13	11	
a ≥ 60	4	19	3	

## Question 2

Table 1

Score	Probability
1	$\frac{3}{10}$
2	$\frac{1}{10}$
3	$\frac{1}{10}$
4	$\frac{2}{5}$
6	$\frac{1}{10}$

Table 2

Score	Probability
1	15
2	4
3	12
4	41
6	8

## Question 4

$x$	$P(X = x)$
$-3$	$q$
$-1$	$\frac{7}{30}$
$1$	$\frac{7}{30}$
$2$	$q$
$4$	$r$