## Standard Deviation Worksheet

1. Calculate the mean and standard deviation of each data set

| (a) | 20 | 21 | 19 | 22 | 21 | 20 | 19 | 20 | 21 | 20 |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| (b) | 303 | 299 | 306 | 298 | 304 | 307 | 299 | 302 | 305 | 299 | 300 |
| (c) | $15 \cdot 3$ | $14 \cdot 9$ | $15 \cdot 1$ | $15 \cdot 2$ | $14 \cdot 8$ | $14 \cdot 7$ | $15 \cdot 1$ | $14 \cdot 8$ | $15 \cdot 0$ | $15 \cdot 0$ |  |
| (d) | 87 | 89 | 84 | 88 | 89 | 87 | 86 | 87 | 86 | 87 |  |

2. The temperatures, in ${ }^{\circ} \mathrm{C}$, at a seaside resort were recorded at noon over a 10-day period.

| 19 | 20 | 19 | 17 | 21 | 18 | 19 | 24 | 25 | 28 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |

Calculate the mean and standard deviation.
3. John plays golf with his brother Joe each month. They keep a note of their scores.

| John | 74 | 73 | 74 | 73 | 71 | 73 | 72 | 75 | 73 | 73 | 72 | 73 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Joe | 68 | 74 | 70 | 67 | 80 | 81 | 69 | 68 | 79 | 67 | 70 | 71 |

Calculate the mean and standard deviation and comment on John and Joe's performance over the year.

## Answers

1
(a)
(b)
(c)
(d)
mean
$20 \cdot 3$
$0 \cdot 95$
302
$14 \cdot 99$
87
SD
$3 \cdot 19$
$0 \cdot 19$
$1 \cdot 49$
2.106, $16 \cdot 7$
3. $21,3 \cdot 6$

