

1. Here's an easy way to do that: Multiply the base set (i.e. 2, 5, 5, 6, 7) with any numbers

- 4, 10, 10, 12, 14
- 6, 15, 15, 18, 21
- 8, 20, 20, 24, 28
- 10, 25, 25, 30, 35
- 12, 30, 30, 36, 42
- 14, 35, 35, 42, 49

Mode < median < mean

2. A) Understanding from this, we can go to the conclusion that Mode is the first 2 numbers as the mode is lesser than the median and the mean is greater than median and mode, we can take these 3 sets:

1	1	2	5	6
1	1	3	7	8
1	1	4	9	10

1 1 2 5 6

Mode = 1 Median = 2 Mean = 3

1 1 3 7 8

Mode = 1 Median = 3 Mean = 4

1 1 4 9 10

Mode = 1 Median = 4 Mean = 5

mode < mean < Median

2. B) Understanding from this, we can go to same conclusion as (A), Mode is the first two numbers, we can take these 3 sets:

Examples

1	1	4
1	5	6
1	6	8

- ①
- ②

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Mode < mean < median

1 1 5 6 7
Mode = 1 Mean = 4 Median = 5

1 1 6 8 9
Mode = 1 Mean = 5 Median = 6

1 1 7 10 11
Mode = 1 Mean = 6 Median = 7

2. C) Not possible

Mean < median < mode

2. D) 1 2 5 6 6
Mean = 4 Median = 5 Mode = 6

1 2 4 5 5
Mean = 3.4 Median = 4 Mode = 5

1 2 3 4 4
Mean = 2.8 Median = 3 Mode = 4

2. E) Not possible

Median < mean < mode

2. F) 4 5 6 10 10
Median = 6 Mean = 7 Mode = 10

8 10 12 20 20
Median = 12 Mean = 14 Mode = 20

12 15 18 30 30
Median = 18 Mean = 21 Mode = 30

3. C) is not possible as the mode has to be the first two numbers & that will make half of the sum needed to the form the mean so we can't form it.

E) Because if you increase the mode, the mean will have to have sum of very high numbers.

⇒ IS IT POSSIBLE USING SET OF 6 NOS?

4. A) Not possible

4. B) Not possible

4. C) Not possible

4. D) 1 2 3 3 (mean < med < mode)
Mean = 2.1 Median = 2.5 Mode = 3

4. E) Not possible

4. F) Not possible

⇒ SHOW THAT ALL OF THEM ARE POSSIBLE USING SET OF 6 NOS

5. A) 1, 1, 1, 2, 2, 3

Mode = 1 Median = 1.5 Mean = 1.6
(mode < med < mean)

B) 1, 1, 3, 4, 5, 6 → (mode < mean < median)

Mode = 1 Mean = 3.3 Median = 3.5

~~ALL~~

~~3~~

~~3~~

~~2 3 66~~

~~3~~

1 2 3 3

2.1
3) 6.5

6

0

C) 1, 8, 8, 9, 10, 11 (mean < mode < median)
Mean = 7.8 Mode = 8 Median = 8.5

D) 1, 1, 2, 3, 3, 3 (mean < median < mode)
Mean = 2.1 Median = 2.5 Mode = 3

E) 1, 2, 3, 4, 4, 11 (median < mode < mean)
Median = 3.5 Mode = 4 Mean = 5

F) 1, 2, 3, 4, 4, 8 (median < mean < mode)
Median = 3.5 Mean = 3.7 Mode = 4