## Mystery bag: Student worksheet

http://topdrawer.aamt.edu.au/Statistics/Good-teaching/Data-collection/Samples-and-populations/Mystery-bag

## Directions

1. Draw a chip from Bag A without looking into the bag.
2. Mark the colour of the chip on the tally chart for Bag A.
3. Put the chip back into the bag.
4. Draw another chip and mark the colour.
5. You should draw 6 chips from Bag A.
6. Close the bag and repeat these steps for the next bag.
7. When you have finished each bag, figure out which label belongs to each bag. Use a paperclip to attach the label to the bag.

| Bag A Matches Card \# ... |  |  | Bag B Matches Card \# ... |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Colour | Tally | Total | Colour | Tally | Total |
| Red |  |  | Red |  |  |
| Yellow |  |  | Yellow |  |  |
| Blue |  |  | Blue |  |  |
| Green |  |  | Green |  |  |


| Bag C Matches Card \# ... |  |  | Bag D Matches Card \# ... |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Colour | Tally | Total | Colour | Tally | Total |
| Red |  |  | Red |  |  |
| Yellow |  |  | Yellow |  |  |
| Blue |  |  | Blue |  |  |
| Green |  |  | Green |  |  |

(see next page)

## Directions

Graph the colours in each bag.

| Contents of Bag A |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 12 |  |  |  |  |
|  | 11 |  |  |  |  |
|  | 10 |  |  |  |  |
|  | 9 |  |  |  |  |
|  | 8 |  |  |  |  |
|  | 7 |  |  |  |  |
|  | 6 |  |  |  |  |
|  | 5 |  |  |  |  |
|  | 4 |  |  |  |  |
|  | 3 |  |  |  |  |
|  | 2 |  |  |  |  |
|  | 1 |  |  |  |  |
|  |  | R | Y | B | G |
| Chip Colour |  |  |  |  |  |


| Contents of Bag B |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 12 |  |  |  |  |
|  | 11 |  |  |  |  |
|  | 10 |  |  |  |  |
|  | 9 |  |  |  |  |
|  | 8 |  |  |  |  |
|  | 7 |  |  |  |  |
|  | 6 |  |  |  |  |
|  | 5 |  |  |  |  |
|  | 4 |  |  |  |  |
|  | 3 |  |  |  |  |
|  | 2 |  |  |  |  |
|  | 1 |  |  |  |  |
|  |  | R | Y | B | G |
| Chip Colour |  |  |  |  |  |


| Contents of Bag C |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 12 |  |  |  |  |
|  | 11 |  |  |  |  |
|  | 10 |  |  |  |  |
|  | 9 |  |  |  |  |
|  | 8 |  |  |  |  |
|  | 7 |  |  |  |  |
|  | 6 |  |  |  |  |
|  | 5 |  |  |  |  |
|  | 4 |  |  |  |  |
|  | 3 |  |  |  |  |
|  | 2 |  |  |  |  |
|  | 1 |  |  |  |  |
|  |  | R | Y | B | C |
|  |  |  |  |  |  |

