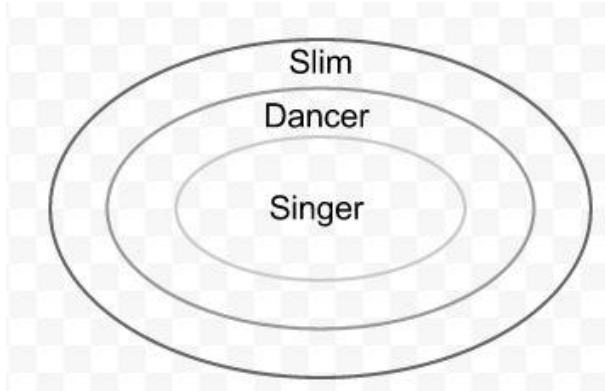


**3 7** The tricky part of this question is that it is phrased negatively.



This means that we have to identify the nature of each group initially and establish the relationship between the groups. Once the illustration is made, the relationship between the groups becomes clearer. The only true statement is that all singers are slim. **The answer is 'All singers are**

**slim'.**

**3 8**

Dan and Guy are siblings, (not half brothers or step-brothers) and therefore Margaret, who is Guy's mother, is also Dan's mother. **The answer is 'Margaret is Dan's mother'.**

**3 9**

The statement **"The number of teachers in Metroville is more than double the number of teachers in Metropolis"** weakens the organizers' judgment with respect to the parking assignment.

**4 0**

It takes 26 cards to build a 4-storey card house.

It takes 40 cards to build a 5-storey card house.

It takes 57 cards to build a 6-storey card house.

It takes 77 cards to build a 7-storey card house.

We increased the number by  $3N - 1$ , where  $N$  is the storey number.

**The solution for N-storey card house is :  $N(3N + 1) / 2$**