

## Answer on Question #53332 - Math - Algebra

### Question

A can of coke costs 64p. A six pack of coke costs £3.20. Find the cheapest way of buying at least 28 cans.

### Solution

A can of coke in six pack costs

$$\frac{£3.20}{6} = 53\frac{1}{3} p$$

So it is cheaper to buy pack then six cans. Rewrite

$$28 = 6 \cdot 4 + 4$$

We need to buy 4 full sets of six pack and 4 cans to get 28 cans.

It will cost

$$4 \cdot £3.2 + 4 \cdot £0.64 = £15.36$$

5 packs will cost  $£3.2 \cdot 5 = £16$ .

**Answer:** 4 full sets of six pack and 4 cans.