

# OCEAN MATHS- SUMMER TERM TIMES TABLES

Year 3

## Start with the easiest and find a pattern

All tables have patterns in their numbers. Some of these are easy to spot and some are harder. Finding and highlighting the pattern in a table can help your child to learn it.

Children are introduced to the 2, 5 and 10 times tables first. These all have clear patterns (see pages 5–7) that can help children to learn them, and they are tables that we use a lot.

## Rhymes and songs

Silly rhymes and songs can help children to remember these patterns, e.g. '0 2 4 6 8, my mum thinks I'm great' – the sillier the better really!

### You can:

- Look at the tables and their patterns on pages 5–7. Highlight the pattern to your child as they try and remember the table.
- See if, together, you can think of a silly rhyme to go with the first few numbers in each table: '5, 10, 15, 20 ...'

## The 10 times table

1	×	10	=	10
2	×	10	=	20
3	×	10	=	30
4	×	10	=	40
5	×	10	=	50
6	×	10	=	60
7	×	10	=	70
8	×	10	=	80
9	×	10	=	90
10	×	10	=	100
11	×	10	=	110
12	×	10	=	120

Children spot the pattern of putting a zero on the end of the number that is multiplied by 10. This can be useful to help them quickly answer 10 times tables calculations, but it is important for them to understand that although it looks like we have just put a zero on the end of the number, we have actually moved its digits to the left and filled the gap with a 0:

Hundreds	Tens	Units
	1	2
1	2	0

In our number system the position of a digit in a number tells us its value; we call this 'place value'. Each time we move one place to the left in a number, the value of the digit increases by 10 times.

## The 5 Times Table

0	×	5	=	0
1	×	5	=	5
2	×	5	=	10
3	×	5	=	15
4	×	5	=	20
5	×	5	=	25
6	×	5	=	30
7	×	5	=	35
8	×	5	=	40
9	×	5	=	45
10	×	5	=	50
11	×	5	=	55
12	×	5	=	60

**Pattern = 0 5 repeated**

If we include  $0 \times 5$ , the digits 0 and 5 repeat themselves over and over again in the units column: 0 5, 0 5, 0 5 ...

The digit in the tens column goes up by 1 each time this pattern starts again.

# 5 TIMES TABLES

## Fishy Fives

Can you replace all numbers that are a multiple of five in this fishy challenge?

**What you need:** Nothing

### How to play:

Step 1: Ask the children/child to start counting in steps of 1, but each time they say a multiple of 5, they need to replace the number with 'Fish'.

Step 2: Start counting from 1 as a class, for example you would say 1, 2, 3, 4, fish, 6, 7, 8, 9, fish.

Step 3: Continue the count in this way to at least 60 (12 x 5).

Step 4: Discuss what children notice about the numbers they are replacing with 'fish'.

Step 5: Vary the game by passing the count along a line/around a circle, so that an individual child says each number, and then the next child in the line/circle says the next number etc.

Step 6: You can also make the game competitive by asking all children to stand up. Begin counting, but if a child makes a mistake (e.g. they say fish when they shouldn't, or they say add the multiple of 5 after 'fish', for example, 1, 2, 3, 4, fish, 5) they are 'out' and sit down. Which child can last the longest?

## The 2 times table

$$(0 \times 2 = 0)$$

$$1 \times 2 = 2$$

$$2 \times 2 = 4$$

$$3 \times 2 = 6$$

$$4 \times 2 = 8$$

$$5 \times 2 = 10$$

$$6 \times 2 = 12$$

$$7 \times 2 = 14$$

$$8 \times 2 = 16$$

$$9 \times 2 = 18$$

$$10 \times 2 = 20$$

$$11 \times 2 = 22$$

$$12 \times 2 = 24$$

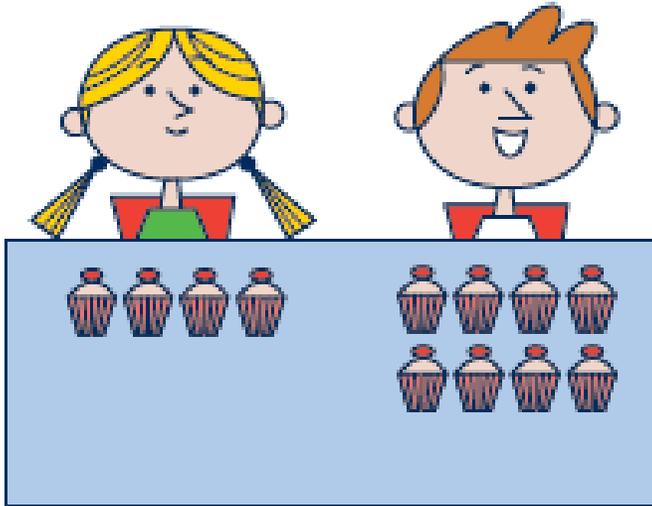
**Pattern = 0 2 4 6 8 repeated**

Including  $0 \times 2$ , the digits 0 2 4 6 8 repeat over and over again in the units column: 0 2 4 6 8, 0 2 4 6 8. The digit in the tens column goes up 1 each time this string starts again.

Another pattern for the 2 times table is **counting in steps of 2**: count a number, miss a number, count a number, miss a number and so on.

## The 2 times table and doubling

Multiplying by 2 is so useful, and is used so often, that it's got its own name – *doubling*. Think of how often you need two lots of something. Children learn that multiplying by 2 is doubling.



4

$$4 \times 2 = 8$$

$$\text{Double } 4 = 8$$

### You can:

- Use the word 'double', as well as the phrases 'times 2' or 'multiply by 2' when your child has to find two lots of a number.

# 2 TIMES TABLES

## **Divided Twos!**

Can you win this game of division bingo?

**What you need:** Mini whiteboards/pieces of paper.

### **How to play:**

Step 1: On a mini whiteboard or piece of scrap paper, ask children to each write down six different 'bingo' numbers between 1 and 12.

Step 2: Call out any division question that is linked to the two times table.

Step 3: If children have the answer to the question on their whiteboard or paper, they cross it off.

Step 4: Try to vary the language used, for example, you may say '20 divided by 2 is...' or '6 in groups of three is...'

Step 5: Once a child has crossed off all of their numbers, they should stand up and shout 'DIVIDED TWOS' before the adult checks to make sure that all of their numbers have been called.

Step 6: The child has to then explain to the group why they have been able to cross at least three of their numbers.

## Doubling and the 4 and 8 times tables

Children are eventually introduced to all of the times tables up to 12. They are often shown how doubling, or multiplying by 2, can help with multiplying by 4 and by 8:

This cake costs £3. How much will it cost if I buy 4 cakes?



# 4 TIMES TABLES

## **Terrible Twenty-Eight**

Watch out for the number 28 in this 'fact passing' game!

**What you need:** Mini whiteboards.

### **How to play:**

Step 1: Arrange children so that they are standing in a circle, with a mini whiteboard and pen at their feet. The adult leading the game should be part of the circle. A child, chosen by the adult, starts by saying ' $0 \times 4 = 0$ '

Step 2: The next child (in the direction chosen by the adult) says the next multiplication fact for the 4 times table (i.e.  $1 \times 4 = 4$ )

Step 3: Children continue passing the 'count' around the circle.

Step 4: If a child has to say ' $7 \times 4 = 28$ ' then they are out, and have to sit down.

Step 5: The count then continues until it reaches ' $12 \times 4 = 48$ ' and then it reverses back to 0 (i.e. the next player says ' $11 \times 4 = 44$ '). Each time a player has to say ' $7 \times 4 = 28$ ' they sit down.

Step 6: Players who are sat down have to then predict (using their reasoning skills) on their mini whiteboard who will be the next player to be 'out'.

Step 7: Two children 'win' the game, the last child standing, and the child who has got the most 'predictions' correct.

Step 8: You can change the 'Terrible' multiplication fact to focus on any multiplication fact from the 4 times table that children are struggling to recall.

# 4 TIMES TABLES

## Four Duel!

Let's duel with the four times table!

**What you need:** a pack of playing cards for each pair of pupils.

### How to play:

Step 1: Give each pair of children a pack of playing cards. Explain that in this game, an Ace is worth 1, a Jack is worth 11 and a Queen or King is worth 12. You can play this game at home with your child.

Step 2: Children take it in turns to turn over one of the cards. The children then race against each other to multiply the number drawn by 4, announcing their answer by placing their hand on the card (in a similar style to when playing a snap based game).

Step 3: If the child who is the first to put their hand on the card says the correct answer, they get to keep the card, if, however, they say the incorrect answer (and their partner spots) their partner gets the card.

Step 4: Keep playing until there are no cards left in the draw pile. You may prefer to set a time limit (e.g. three minutes) per round.

Step 5: The player with the most cards at the end of the round wins.

# 8 TIMES TABLES

[https://www.youtube.com/watch?v=6F5HNQeDUUg&list=PLB5TN0ac12P\\_4pUHVpS8uVw07NZCqwT0g&index=4](https://www.youtube.com/watch?v=6F5HNQeDUUg&list=PLB5TN0ac12P_4pUHVpS8uVw07NZCqwT0g&index=4)

## **Eight Hold Up!**

Can your pair hold up the answer to the question your teacher calls out first?

**What you need:** Medium digit cards 0-10 (create your own digit cards at home).

### **How to play:**

Step 1: Give each pair two sets of medium 0-9 digit cards.

Step 2: Call out questions related to multiplication or division and the 8 times table.

Step 3: Children race to hold up the digit card(s) that form the answer.

Step 4: The first five pairs who answer correctly gain a point.

Step 5: Ask a child from a pair who has gained a point to justify and explain their answer.

Step 6: Keep playing until one pair has gained six points.

# 3 TIMES TABLES

<https://www.youtube.com/watch?v=9XzfQUXqiYY>

## Reciting tables

With times tables, there's nothing like a couple of minutes practice a day to help them stick in the mind. Many children find that reading and hearing themselves say a table regularly helps them to learn it.

Here are some reciting tips:

- Find a time and place for reciting that's easy to keep to. The bathroom at teeth-brushing time can work well as there's nothing much else to do!
- Just start with the first three or four lines of the table for a few days, and then add one or two more lines each time.
- Each time they practise, ask your child to first read the table from the sheet, and then see how far they can go with their eyes closed. Being able to recall something without looking at it is an important step to getting it lodged in our memory.
- Rhythm, sound, movement, and humour, can all really help us to remember things, so children can give the table a bit of a funky tune and beat as they recite it and maybe even a few little dance moves!
- Some children learn a table best by reciting the whole thing – the calculation (e.g.  $3 \times 8$ ) and the answer (24). Other children remember the table better if they just recite the answers – 8, 16, 24 and use their fingers to remember which multiple of 8 they have got to.



### You can:

- Write, or print, a times table such as the one on page 25. Stick it up somewhere in your home, such as the bathroom wall, where your child will find it easy to practise for a few minutes a day.
- Help your child to use the tips listed above when reciting a times table.

Follow the link below to  
watch some fun ways you can  
practice times tables at  
home:

[https://www.youtube.com/watch?v=5\\_RBfrNAZEY&list=PLB5TN0ac12P\\_4pUHVpS8uVw07NzcqwT0g&index=6](https://www.youtube.com/watch?v=5_RBfrNAZEY&list=PLB5TN0ac12P_4pUHVpS8uVw07NzcqwT0g&index=6)