

# POWER UP



Number Partners is an innovative scheme which promotes the enjoyment of maths amongst young people in primary and secondary schools

## Playing Power Up

### Resources needed:

Dice, 5 counters of the same colour for each player. Each player takes 5 pieces of one colour.

Players start by placing their pieces on any five different, nonadjacent spaces on the board. Players have exactly one minute to place their pieces!

Take turns to roll the dice: you must move one of your counters to an empty space with any power of the number rolled. E.g. Roll a 4, move to any space with a power of 4 such as  $4^2 = 4 \times 4 = 16$  or  $4^3 = 4 \times 4 \times 4 = 64$

**The aim is to capture all of your opponent's pieces.** A capture is made by moving a piece either onto or adjacent to your opponent's piece. That piece is captured and removed from the board.

**The winner is the last player with a counter left on the board.**

If you'd like to find out how you can help and why everyone will benefit if you do, please contact your volunteering coordinator or email [info@numberpartners.org](mailto:info@numberpartners.org) [www.numberpartners.org](http://www.numberpartners.org)



## Table of Powers

Cover up when not needed!

2  $2^2 = 4$  |  $2^3 = 8$  |  $2^4 = 16$  |  $2^5 = 32$  |  $2^6 = 64$

3  $3^2 = 9$  |  $3^3 = 27$  |  $3^4 = 81$

4  $4^2 = 16$  |  $4^3 = 64$

5  $5^2 = 25$

6  $6^2 = 36$

7  $7^2 = 49$

8  $8^2 = 64$

9  $9^2 = 81$

10  $10^2 = 100$

A number to the power 1 is itself: e.g.  $8^1 = 8$  or  $4^1 = 4$   
Any number to the power 0 is 1: e.g.  $7^0 = 1$  or  $3^0 = 1$

Any power of 1 is still 1 e.g.  $1^3 = 1$