



TOPPERS HUB
ACADEMY

ALL-CLASS & COMPETITIVE BOOSTER

Speed Maths

Mental Calculation & Vedic Tricks

A free study resource by **Toppers Hub Academy**

Founder & Director: **Mrs. Neeru Nanda**

20 years • 10,000+ students • 500+ toppers • 5.0★ on Google

1945 P, Sainik Colony, Sector 49, Faridabad, Haryana 121001

Call / WhatsApp: +91 98916 12831 (9891612831) • toppershubacademy.odoo.com

Multiplication Shortcuts

- Multiply by 11 (two digits 'ab'): write a, then (a+b), then b. Example: $34 \times 11 = 3(3+4)4 = 374$.
- Square of a number ending in 5: $n5^2 = n(n+1)$ followed by 25. Example: $35^2 = 3 \times 4 = 12$, so 1225.
- Multiply by 5: multiply by 10 and then halve. Example: $46 \times 5 = 460/2 = 230$.
- Multiply by 9: multiply by 10 and subtract the number. Example: $27 \times 9 = 270 - 27 = 243$.

Divisibility Rules

- By 2: the last digit is even.
- By 3: the sum of the digits is divisible by 3.
- By 4: the last two digits form a number divisible by 4.
- By 5: the last digit is 0 or 5.
- By 9: the sum of the digits is divisible by 9.
- By 11: the difference of alternating digit sums is 0 or divisible by 11.

Percentage & Estimation Tricks

- $x\%$ of $y = y\%$ of x . Example: 8% of $50 = 50\%$ of $8 = 4$.
- To find 10%, move the decimal one place left; 5% is half of that.
- Fraction shortcuts: $1/8 = 12.5\%$, $1/6 \approx 16.67\%$, $3/4 = 75\%$.
- Approximate large multiplications by rounding, then adjust.

Why It Helps

- Saves precious minutes in board exams and entrance tests.
- Reduces silly calculation mistakes under pressure.
- Builds number sense useful for CUET, CA Foundation QA and aptitude tests.
- Practise 10 minutes daily and speed becomes automatic.

Want a speed-maths practice session with our faculty?

Message us on WhatsApp at +91 98916 12831 or visit toppershubacademy.odoo.com to book a FREE demo class and get your full batch details.