

# ANGLES ON PARALLEL LINES

Answer all of these questions. Remember to show your working out in all questions.

## MAIN QUESTIONS

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1. Find the value of  $x$  if the corresponding angles are  $75^\circ$  and  $3x^\circ$
2. Find the value of  $y$  if the alternate angles are  $110^\circ$  and  $5y^\circ$
3. Find the value of  $z$  if the co-interior angles are  $60^\circ$  and  $4z^\circ$
4. Find the value of  $a$  if the corresponding angles are  $8a^\circ$  and  $120^\circ$
5. Find the value of  $b$  if the alternate angles are  $7b^\circ$  and  $140^\circ$
6. Find the value of  $c$  if the co-interior angles are  $3c^\circ$  and  $150^\circ$
7. Find the value of  $d$  if the corresponding angles are  $5d^\circ$  and  $95^\circ$
8. Find the value of  $e$  if the alternate angles are  $4e^\circ$  and  $88^\circ$
9. Find the value of  $f$  if the co-interior angles are  $6f^\circ$  and  $102^\circ$
10. Find the value of  $g$  if the corresponding angles are  $9g^\circ$  and  $135^\circ$
11. Find the value of  $h$  if the alternate angles are  $10h^\circ$  and  $170^\circ$
12. Find the value of  $k$  if the co-interior angles are  $12k^\circ$  and  $48^\circ$
13. Find the value of  $m$  if the corresponding angles are  $7m^\circ$  and  $161^\circ$
14. Find the value of  $n$  if the alternate angles are  $11n^\circ$  and  $121^\circ$

15. Find the value of  $p$  if the co-interior angles are  $5p^\circ$  and  $115^\circ$

17. Find the value of  $r$  if the alternate angles are  $8r^\circ$  and  $144^\circ$

19. Find the value of  $t$  if the corresponding angles are  $10t^\circ$  and  $170^\circ$

16. Find the value of  $q$  if the corresponding angles are  $6q^\circ$  and  $114^\circ$

18. Find the value of  $s$  if the co-interior angles are  $9s^\circ$  and  $81^\circ$

## MASTER QUESTIONS



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M1. Two parallel lines are intersected by a transversal. One of the corresponding angles is  $5x^\circ$  and the other is  $3x + 40^\circ$ . Find the value of  $x$  and the measure of each angle.