

THE UNIVERSITY INTERSCHOLASTIC LEAGUE

TIE BREAKER

**Number 181**

1.  $\frac{\sqrt{0.492 \times 3.66} \times 0.0228}{8.42 \times 0.293 \times 0.765}$  ----- equals \_\_\_\_\_
2.  $\frac{(0.917 \times 0.0375)^2}{2.86 \times 0.483 \times \pi} \times \sqrt[3]{\frac{872}{0.664}}$  ----- equals \_\_\_\_\_
3.  $\sqrt{\frac{6.27}{0.0439}} \times \left[\frac{\pi^2}{4.75}\right]^2 \times \sqrt[3]{\sqrt{0.836}}$  ----- equals \_\_\_\_\_
4.  $\left[\frac{(0.282 \times 36 \times 7.2)^2 \times 0.255}{(0.391 \times 1.88)^3 \times \sqrt[3]{0.00216}}\right]^2$  ----- equals \_\_\_\_\_
5.  $\sqrt{\frac{0.000678}{\sqrt{\frac{3.79 \times 1.5}{0.39 \times 0.882}}}} \times \frac{9.22 \times \pi^3}{\sqrt[3]{\frac{4.76 \times 1.15}{91.7 \times 0.045}}}$  ----- equals \_\_\_\_\_
6.  $\left[\frac{\left[\frac{7.28}{9.46}\right]^2}{\frac{0.664}{0.0825}}\right]^2 \times \frac{\sqrt[3]{\pi}}{3} \times \frac{\sqrt{\frac{0.878}{0.0926}}}{\frac{21 \times 8}{12 \times 75}}$  ----- equals \_\_\_\_\_
7.  $\frac{45 \times 3.82 \times 0.6 \times 0.524 \times 8.08}{\left[\frac{13,800 \times 9.5}{727 \times 8610}\right]^3 \times \sqrt{\frac{0.0000772}{0.14 \times 0.367}}}$  ----- equals \_\_\_\_\_
8.  $\sqrt{\sqrt{\sqrt{\frac{0.832}{0.0446}}}} \times \left[\frac{\frac{0.891 \times 3.62}{7.05 \times 2.15}}{(3.18 \times 1.62)^2}\right]^2$  ----- equals \_\_\_\_\_
9.  $\sqrt{\frac{\frac{6.37}{0.0524}}{\frac{0.00866}{0.000379}}} \times \left[\frac{804}{726} \times \frac{309}{215}\right]^3 \times \frac{\frac{\pi}{\sqrt[3]{\pi}}}{\frac{17}{39}}$  ----- equals \_\_\_\_\_
10.  $\frac{\left[(2.86 \times 1.55)^3 \times 0.0000824\right]^2}{\frac{0.936}{0.721} \times \sqrt{\frac{0.008 \times 0.0316}{721 \times 14.6 \times 12}}}$  ----- equals \_\_\_\_\_

$$11. \sqrt{\frac{\sqrt{3.2 \times 0.0514}}{0.816 \times 0.00446}} \times \left[ \frac{29 \times 71 \times 36}{48 \times 16 \times 82} \right]^2 \Bigg]^3 \text{ ----- equals } \underline{\hspace{2cm}}$$

$$12. \left[ \frac{(0.0328)^3}{0.000027} \right]^2 \times \sqrt{\frac{\sqrt{\frac{0.000339}{\sqrt{4.29 \times 3.86}}}}{4.81 \times 9.72 \times 1.66}} \text{ ----- equals } \underline{\hspace{2cm}}$$

$$13. \frac{\sqrt{\sqrt{\sqrt{2.45 \times 6.87 \times 1.92 \times 4.82}}}}{\left[ 19.6 \times \left[ 0.115 \times (2.63 \times 0.225)^2 \right]^2 \right]^2} \text{ ----- equals } \underline{\hspace{2cm}}$$

$$14. \sqrt{\frac{0.902 \times 2.11}{\sqrt{\frac{0.00275}{\sqrt{3.08 \times 3.57}}}}} \times \left[ \frac{\pi^3}{\left[ \frac{392}{871} \right]^2} \right]^2 \text{ ----- equals } \underline{\hspace{2cm}}$$

$$15. \frac{\sqrt{3.92} \times 3,640,000 \times 0.337}{\left[ \frac{8.29}{3.44} \right]^2 \times \frac{424 \times 82 \times 731}{0.0000292 \times 376}} \text{ ----- equals } \underline{\hspace{2cm}}$$

$$16. \left[ \frac{932}{876} \right]^3 \times \frac{\sqrt[3]{\pi}}{\pi} \times \frac{\left[ \frac{71 \times 4}{6 \times 83} \right]^2}{\sqrt{0.0882}} \text{ ----- equals } \underline{\hspace{2cm}}$$

$$17. \frac{\frac{3.77 \times 7.07}{1.45 \times 8.26}}{\sqrt[3]{2.88 \times 9.16}} \times \sqrt{\frac{\sqrt{\sqrt{1.55 \times 72}}}{0.928 \times 0.664}} \text{ ----- equals } \underline{\hspace{2cm}}$$

$$18. \frac{\sqrt{(3.28 \times 1.75)^3 \times \sqrt{48 \times \pi}}}{\left[ \frac{2.18 \times 0.449 \times 0.0827}{0.0336 \times 0.816 \times 5.22} \right]^2} \text{ ----- equals } \underline{\hspace{2cm}}$$

$$19. \frac{\left[ \frac{8.67}{31.4} \right]^3 \times \sqrt{\frac{27}{48.6}} \times \left[ \frac{3.92}{1.09} \right]^2}{\sqrt[3]{0.276 \times 8.21 \times 0.0337}} \text{ ----- equals } \underline{\hspace{2cm}}$$

THE UNIVERSITY INTERSCHOLASTIC LEAGUE: ANSWER KEY, SLIDE RULE TEST 181  
(Tie Breaker)

THE UNIVERSITY	INTERSCHOLASTIC	LEAGUE:	ANSWER KEY, SLIDE RULE TEST 181 (Tie Breaker)
1. $1.62 \times 10^{-2}$	$(1.60 \times 10^{-2})$	to	$1.64 \times 10^{-2}$
2. $2.98 \times 10^{-3}$	$(2.96 \times 10^{-3})$	"	$3.00 \times 10^{-3}$
3. $5.01 \times 10^1$	$(4.99 \times 10^1)$	"	$5.03 \times 10^1$
4. $7.04 \times 10^8$	$(7.02 \times 10^8)$	"	$7.06 \times 10^8$
5. 3.36	$(3.34)$	"	$3.38)$
6. $4.36 \times 10^{-2}$	$(4.34 \times 10^{-2})$	"	$4.38 \times 10^{-2}$
7. $1.23 \times 10^9$	$(1.21 \times 10^9)$	"	$1.25 \times 10^9$
8. $9.27 \times 10^{-5}$	$(9.25 \times 10^{-5})$	"	$9.29 \times 10^{-5}$
9. 5.19	$(5.17)$	"	$5.21)$
10. $8.87 \times 10_1^{-1}$	$(8.85 \times 10_1^{-1})$	"	$8.89 \times 10_1^{-1}$
11. $2.81 \times 10_{-1}^{-1}$	$(2.79 \times 10_{-1}^{-1})$	"	$2.83 \times 10_{-1}^{-1}$
12. $7.43 \times 10^3$	$(7.41 \times 10^3)$	"	$7.45 \times 10^3)$
13. $3.64 \times 10^5$	$(3.62 \times 10^5)$	"	$3.66 \times 10^5)$
14. $1.90 \times 10^5$	$(1.88 \times 10^5)$	"	$1.92 \times 10^5)$
15. $1.81 \times 10^{-4}$	$(1.79 \times 10^{-4})$	"	$1.83 \times 10^{-4}$
16. $2.10 \times 10^{-8}$	$(2.08 \times 10^{-8})$	"	$2.12 \times 10^{-8}$
17. 1.72	$(1.70)$	"	$1.74)$
18. $1.51 \times 10^2$	$(1.49 \times 10^2)$	"	$1.53 \times 10^2)$
19. $4.78 \times 10^{-1}$	$(4.76 \times 10^{-1})$	"	$4.80 \times 10^{-1}$