Order of Operations with Decimals (G)

Name: _____ Date: _____

Simplify each expression using the correct order of operations.

$3{,}4 \times (8{,}5 + (-4{,}2) - 2{,}3)^2$

$2{,}4 - (-8{,}4)^2 \div ((-5{,}4) + (-3{,}6))$

$(4{,}9)^2 + 5{,}1 \times (9{,}2 - 0{,}5)$

$(-7{,}2) \div ((-7{,}4) - 3{,}1 + 9{,}7)^2$

$\left((-2{,}2)^2 - 1{,}6 \times (-6{,}5)\right) \div (-1{,}2)$

$(-7{,}5) \times \left((-6{,}5) + (-0{,}2)^2 - 5{,}8\right)$

$(3{,}6 - (-5{,}9) + (-8{,}5)) \times (-1{,}6)^2$

$(-7{,}5) - 1{,}3 \div (0{,}9 + (-1{,}1))^2$

Order of Operations with Decimals (G) Answers

Name: _____ Date: _____

Simplify each expression using the correct order of operations.

$3{,}4 \times \left(\underline{8{,}5 + (-4{,}2)} - 2{,}3\right)^2$

$= 3{,}4 \times \left(\underline{4{,}3 - 2{,}3}\right)^2$

$= 3{,}4 \times \underline{2^2}$

$= \underline{3{,}4 \times 4}$

$= 13{,}6$

$2{,}4 - (-8{,}4)^2 \div \left(\underline{(-5{,}4) + (-3{,}6)}\right)$

$= 2{,}4 - \underline{(-8{,}4)^2} \div (-9)$

$= 2{,}4 - \underline{70{,}56 \div (-9)}$

$= \underline{2{,}4 - (-7{,}84)}$

$= 10{,}24$

$(4{,}9)^2 + 5{,}1 \times \left(\underline{9{,}2 - 0{,}5}\right)$

$= \underline{(4{,}9)^2} + 5{,}1 \times 8{,}7$

$= 24{,}01 + \underline{5{,}1 \times 8{,}7}$

$= \underline{24{,}01 + 44{,}37}$

$= 68{,}38$

$(-7{,}2) \div \left(\underline{(-7{,}4) - 3{,}1} + 9{,}7\right)^2$

$= (-7{,}2) \div \left(\underline{(-10{,}5) + 9{,}7}\right)^2$

$= (-7{,}2) \div \underline{(-0{,}8)^2}$

$= \underline{(-7{,}2) \div 0{,}64}$

$= -11{,}25$

$\left(\underline{(-2{,}2)^2} - 1{,}6 \times (-6{,}5)\right) \div (-1{,}2)$

$= \left(4{,}84 - \underline{1{,}6 \times (-6{,}5)}\right) \div (-1{,}2)$

$= \left(\underline{4{,}84 - (-10{,}4)}\right) \div (-1{,}2)$

$= \underline{15{,}24 \div (-1{,}2)}$

$= -12{,}7$

$(-7{,}5) \times \left((-6{,}5) + \underline{(-0{,}2)^2} - 5{,}8\right)$

$= (-7{,}5) \times \left(\underline{(-6{,}5) + 0{,}04} - 5{,}8\right)$

$= (-7{,}5) \times \left(\underline{(-6{,}46) - 5{,}8}\right)$

$= \underline{(-7{,}5) \times (-12{,}26)}$

$= 91{,}95$

$\left(\underline{3{,}6 - (-5{,}9)} + (-8{,}5)\right) \times (-1{,}6)^2$

$= \left(\underline{9{,}5 + (-8{,}5)}\right) \times (-1{,}6)^2$

$= 1 \times \underline{(-1{,}6)^2}$

$= \underline{1 \times 2{,}56}$

$= 2{,}56$

$(-7{,}5) - 1{,}3 \div \left(\underline{0{,}9 + (-1{,}1)}\right)^2$

$= (-7{,}5) - 1{,}3 \div \underline{(-0{,}2)^2}$

$= (-7{,}5) - \underline{1{,}3 \div 0{,}04}$

$= \underline{(-7{,}5) - 32{,}5}$

$= -40$