

Name \_\_\_\_\_



## Fractions, Decimals & Mixed Operations Adventure

**Directions:** Solve each problem carefully. Show your work and include units in your answers. You'll need to use all your skills - fractions, decimals, and mixed operations - to complete this final journey!

**1. The Deep Dive** - A diver descends 3.6 meters per minute for 8 minutes, then rises 4.2 meters to reach a safe level. How deep is the diver now?

**2. The Hidden Crate** - A crate contains 24 gold coins. Each coin weighs 12.5 grams. If  $\frac{1}{3}$  of the coins are removed, what is the total weight of the coins still in the crate?

**3. Oxygen Supply** - A tank holds 9.6 liters of oxygen. Each dive uses 1.2 liters. After 5 dives, how many liters remain?

**4. The Treasure Ledger** - A ledger shows three treasure amounts: 125.75, 248.50, and 306.25 gold pieces. After paying 185.25 in taxes, how much treasure remains?

**5. Pearl Polishing** - A jeweler can polish 4.5 pearls per hour. If they work for 6.5 hours but spend 0.5 hours on breaks, how many pearls are polished?

**6. Sharing the Gemstones** - A chest holds 72 gemstones.  $\frac{2}{3}$  of them are emeralds, and the rest are rubies. The emeralds are shared equally among 6 traders. How many emeralds does each trader receive?

**7. The Weight of Gold Bars** - Three gold bars together weigh 7.8 kilograms. Each bar weighs the same. What is the weight of one bar?

**8. The Sunken Map** - The map is torn into 8 equal pieces. Each piece shows 0.125 of the island. What fraction of the island does the entire map represent when assembled?