

Stoich HW #3 name: _____

Zinc reacts with $\text{HCl}_{(\text{AQ})}$ releasing hydrogen gas while forming a new solution.

Write the balanced chemical equation for this reaction.

On loose leaf paper do the following three problems.

1. You start with 548 grams of zinc and sufficient acid to completely react all of the zinc. How many formula units of zinc chloride form?
2. You end with 944 liters of hydrogen. How many grams of zinc are required?
3. You measure 4.91×10^{24} atoms of zinc completely react. How many liters of hydrogen gas form?

Use plenty of paper, use all your units, do a fine job, make yourself proud.