

NOW AVAILABLE - BOOK

The Hydrogen Economy

fundamentals, technology, economics

The "Hydrogen Economy" is very broad subject ranging from the potential use of hydrogen for domestic use to the mass production of hydrogen replacing coal, natural gas (LNG) and conventional transport fuels.

For any given project to make, store and transport hydrogen there are many alternatives for each stage. The book aims to assist proponents, financiers of hydrogen projects to identify the optimum project and identify hurdles and approaches to overcoming them. This book attempts to describe an optimum approach to implementation and in particular its cost. It sets out to identify hurdles to implementation which may not be apparent to those entering the field for the first time.

The book covers the various means and costs of production from fossil fuels (with carbon capture) - blue hydrogen - electrolysis - green hydrogen - or biomass . The book covers hydrogen storage as liquid or compressed gas and transport, through pipelines as liquid or by an intermediary fluid such as ammonia or a hydrocarbon.

The book discusses the production and costs of hydrogen delivery at the user end of a logistics chain. It also compares the relative energy value of energy delivered hydrogen versus the current suite of conventional fuels.

CHAPTERS COVER:

1. THE MARKET FOR HYDROGEN
2. METHODS OF HYDROGEN PRODUCTION
3. THE COST F HYDROGEN PRODUCTION FROM FOSSIL FUELS
4. THE PRODUCTION OF HYDROGEN FROM RENEWABLE SOURCES
5. HYDROGEN STORAGE AND TRANSPORT
6. THE MASS SHIPPING OF HYDROGEN
7. COMPETITIVE POSITION OF HYDROGEN VERSUS FOSSIL FUELS
8. CASE STUDIES FOR THE HYDROGEN ECONOMY

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