



Hydrogen Certificate (H2C)

November 2022

Strategy

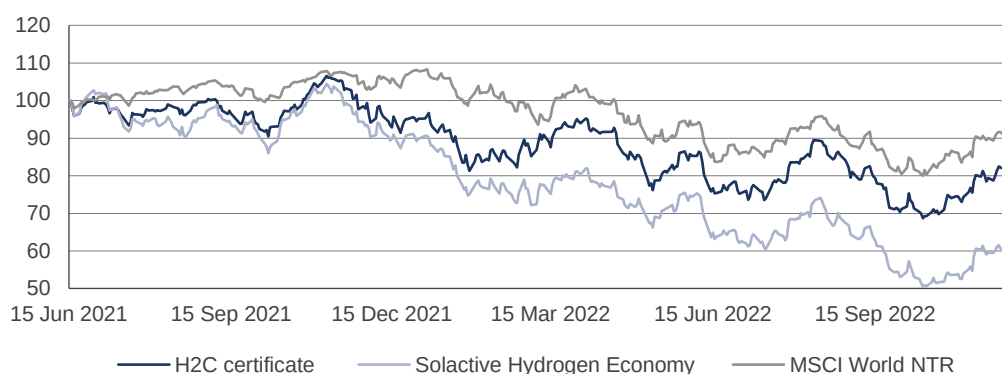
Thematic global equity exposure to best capture the developments of the hydrogen economy.

Concentrated portfolio of 25 stocks that demonstrate above-average thematic exposure, based on materiality assessment. The stock selection process includes proprietary quantitative screens and qualitative evaluation.

Diversified exposure across 4 hydrogen buckets: Core (direct hydrogen sales, electrolyzers, fuel cells), Infrastructure (clean power – upstream – and H2 transportation – downstream), Decarb users (hydrogen as a feedstock/fuel/heat) and Tech enablers (intangible know how that can facilitate the deployment of hydrogen).

Performance¹

	MTD	YTD	Since certificate inception
H2C certificate	8.0%	-15.5%	-19.5%
Solactive Hydrogen Economy	11.1%	-33.7%	-40.3%
MSCI World	7.0%	-14.5%	-7.8%



	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Year
2022	-11.9%	6.9%	5.4%	-8.5%	-1.2%	-11.8%	11.1%	-1.7%	-13.3%	4.7%	8.0%		-15.5%
2021						-0.6%	-2.0%	2.3%	-5.9%	8.8%	-4.0%	-2.7%	-4.8%

Comment

In November the hydrogen strategy posted a strong result with a positive performance of +8.0%, compared to +11.1% for the benchmark Solactive Hydrogen Economy and +7.0% for the MSCI World.

The Core bucket (55.4% of portfolio) was the largest contributor (+5.1%) to the performance thanks to Industrials (e.g. NEL, Ceres Power, Bloom Energy). Regarding individual stocks, ITM Power (+24.8%), Aurubis (+18.6%) and NEL (+18.3%) outperformed significantly. Plug Power (-0.1%, reported below consensus results, reaffirmed FY22 revenue guidance 5-10% lower and confirmed FY23 guidance) was the only position to post a negative performance over the month.

Key Information

Structure

Open-end actively managed certificate
(SSPA category: Tracker certificate, 1300)

Issuer

Zürcher Kantonalbank, Zurich (S&P AAA)

Investment Manager

Rothschild & Co Bank AG, Zurich

Asset class

Equities

Portfolio management strategy

Active

ISIN

CH1105866276

Currency

USD

Inception date

15-Jun-2021

Dividend policy

Net dividend reinvested

Liquidity

Daily

¹ Risk and return data is calculated net of fees.

Past performance is not a reliable indicator or guarantee of future performance.

Market update

The International Renewable Energy Agency (IRENA) published during COP27 its "Accelerating Hydrogen Deployment in G7: Recommendations for the Hydrogen Action Pact" report.

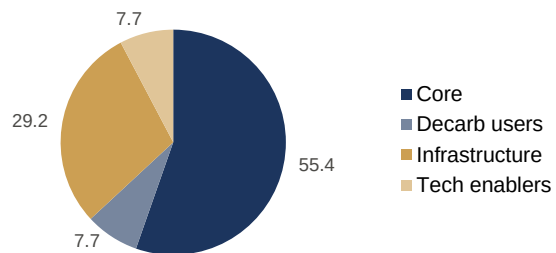
The commitment by G7 countries to reach net zero emissions by 2050 will require a significant deployment of green hydrogen. This also centre-stages the decarbonisation of end uses and hard-to-abate sectors like chemical production, steelmaking, long-haul aviation and shipping, as highlighted on the report.

The report encourages a G7 framework to align policy making and make concrete commitments to harmonise hydrogen standards and certification, share lessons from early implementation, balance the focus on supply with demand creation, promote hydrogen uptake in industrial applications and conduct more targeted collaboration with industry stakeholders and civil society.

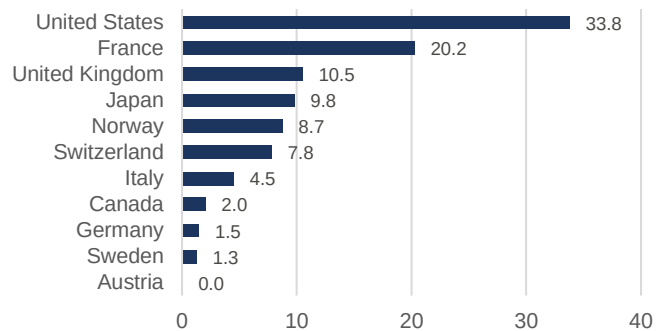
Portfolio rebalancing

We closed the position on Verbund (-1.1%, Infrastructure) and bought Burckhardt Compression (+1.1%, Infrastructure). We reduced Emerson Electric (-1.4%, Infrastructure) and increased Bloom Energy (+1.4%, Core).

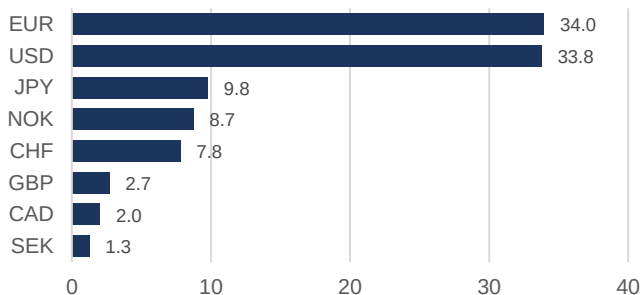
H2 "bucket" allocation (%)



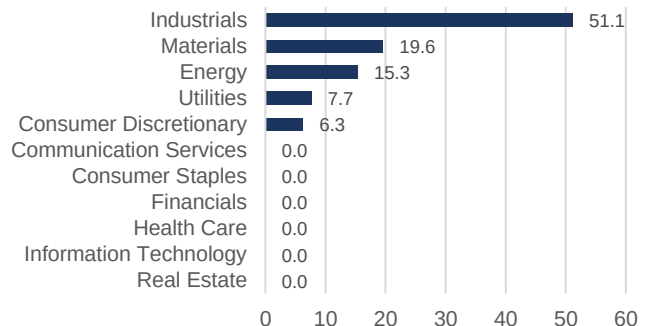
Country allocation (%)



Currency allocation (%)



Sector allocation (%)



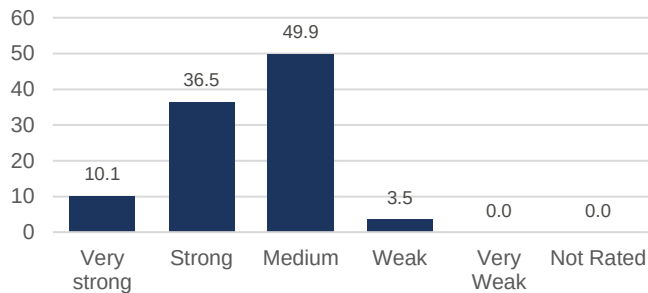
Top 10 holdings

Rank	Company name	Country	Sector	H2 "bucket"	Weight
1	Linde PLC	United Kingdom	Materials	Core	7.8%
2	Air Liquide SA	France	Materials	Core	6.8%
3	ABB AG	Switzerland	Industrials	Core	6.8%
4	IDEX Corp	United States	Industrials	Infrastructure	6.6%
5	Bloom Energy Corp	United States	Industrials	Core	6.6%
6	Gaztransport et technigaz SA	France	Energy	Core	6.5%
7	Toyota Motor Corp	Japan	Consumer Discretionary	Decarb users	6.3%
8	Emerson Electric Co	United States	Industrials	Infrastructure	5.0%
9	Equinor ASA	Norway	Energy	Infrastructure	4.9%
10	AECOM	United States	Industrials	Tech enablers	4.7%

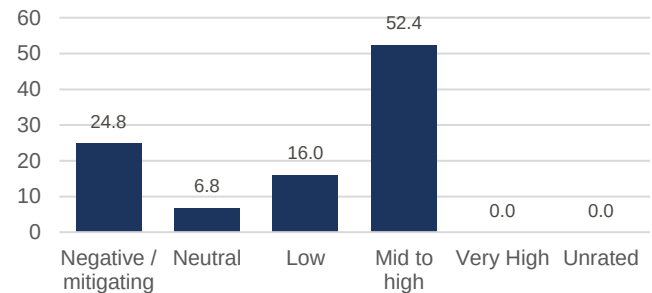
ESG portfolio characteristics

Portfolio ESG track record	Medium	Portfolio carbon exposure	Low
Portfolio average rating	A	Average CO₂ sales intensity	396.3

ESG – Position distribution (%)



Carbon – Position distribution (%)



Largest positions

Company name	Weight	ESG track record	MSCI ESG rating	Carbon exposure risk	CO ₂ sales intensity
Linde PLC	7.8%	Medium	A	Mid to high	1332.8
Air Liquide SA	6.8%	Medium	A	Mid to high	1370.4
ABB AG	6.8%	Strong	AA	Neutral	14.0
IDEX Corp	6.6%	Strong	AA	Low	15.7
Bloom Energy Corp	6.6%	Medium	BBB	Negative / mitigating	190.3
Gaztransport et technigaz SA	6.5%	Medium	A	Mid to high	245.4
Toyota Motor Corp	6.3%	Medium	C	Mid to high	21.6
Emerson Electric Co	5.0%	Medium	A	Mid to high	45.6
Equinor ASA	4.9%	Very Strong	AAA	Mid to high	136.3
AECOM	4.7%	Strong	AA	Negative / mitigating	7.0

Remarks

- The ESG track record and the MSCI ESG Rating measure how well a company performs on environmental, social and governance issues compared to other companies (peers) in the same industry. The importance of the 3 different factors varies by industry. Companies with a below average ESG track record / MSCI ESG Rating are considered riskier since they are more likely to be impacted by factors such as controversies, new social and environmental regulations, bad reputation, litigation risk, poorly motivated work force and financial mis-management.
- The Carbon Exposure Risk measures the probability and severity that a company is negatively impacted by climate change. Climate change exposure can be physical, for example through extreme heat or flooding, policy related, for example through the introduction of a carbon tax, or technological, for example through competitors developing greener products. The risk is a function of the company's exposure to climate change and of how well the company is managing that exposure.
- The CO₂e Sales Intensity measures how much CO₂ equivalents are emitted by a company per USD 1 million sales in the most recent reporting year as reported by MSCI ESG Research. The emissions are direct emissions generated by sources owned or controlled by the company and those from the generation of purchased energy.
- The ESG distributions in the charts exclude money market and derivative positions such as foreign currency forwards.

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