

# WORLD ECONOMIC OUTLOOK

## WORLD FINANCIAL MARKETS & STATE - TAIWAN - THE WAR IN UKRAINE

### HUGHES ECONOMICS (HE) – September 2022

The current review below calculates probabilities for Financial Markets outcomes, the situation over Taiwan, the possibility of another depression and the war in Ukraine. All papers as below are available on this website as are various spreadsheets (xlsx format). All calculations below used the **LoHiProbs.xlsx** spreadsheet.

Probability calculations below for the scenarios outlined are explained in *Structuring Probability Assessments* available at <https://doi.org/10.17265/1537-1506/2020.05.003>. Also *Thinking Probabilistically* available at <https://doi.org/10.17265/1537-1506/2021.05.002>, *Thinking Probabilistically Revisited* available at <https://doi.org/10.17265/1537-1506/2022.01.001> and *A New Approach to Probability Assessment* available at <https://doi.org/10.17265/1537-1506/2022.01.003>.

## WORLD FINANCIAL MARKETS

As stated previously, three possible scenarios are proposed for the next 6 months as listed below in order of increasing likelihood:

- **BB**: Bubble bursts and Dow corrects to below 30,000 or a 10%+ correction
- **TINA**: There is no alternative, and the Dow rises significantly to 40,000+.
- **SQ**: Status Quo, no major moves for the Dow in the range 30,000 – 35,000. At 31.8.22 the Dow was 31,510.

Markets lately have shown some volatility but appear to be awaiting direction on how the fight against inflation will pan out. Continuing COVID problems also weigh on investor attitudes. On balance, **HE** now judges **BB** and **TINA** to be equally likely

**PROBABILITIES ON WORLD FINANCIAL MARKETS FOR THE NEXT 6 MONTHS**

Scenarios		Pairwise Range		Probabilities						More Likely Value
Events	Ratios	Low	High	Low	High	Average	Final	%	Previous	
BB	Base = 1	1.00	1.00	0.16667	0.12500	0.14583	0.146	15	40	1.00
TINA	TINA/BB	1.00	1.00	0.16667	0.12500	0.14583	0.146	15	5	1.00
SQ	SQ/TINA	4.00	6.00	0.66667	0.75000	0.70833	0.708	70	55	4.86
				<b>1.000001</b>	<b>1.000000</b>	<b>0.99999</b>	<b>1.000</b>	<b>100</b>	<b>100</b>	

Powell's comments at Jackson Hole have shaken the markets somewhat. Clearly the Fed has indicated a more hawkish policy until the US inflation rate is contained.

## WORLD FINANCIAL STATE

Scenarios in order of increasing likelihood are as follows:

- **D** or Depression: High inflation and continued COVID-19 pressures, policy mistakes and global financial collapse.
- **MR** or Mild Recession: Unemployment rises with hospitality etc. sectors subdued with a developing Omicron virus.
- **MB** or Mild Boom: Revamping of world infrastructure in light of Ukraine sees markets rise for 10%+ gains.
- **SQ** or Status Quo: All markets steady, significant but not rampant inflation, continued but containable COVID episodes.

The Ukraine war overhangs the world economy but Germany's new outlook and the pivot towards western energy sources away from Russian could strengthen major western economies favouring **MB**. The recessionary scenarios are now seen as less likely.

**PROBABILITIES ON THE WORLD FINANCIAL STATE FOR THE NEXT 6 MONTHS**

Scenarios		Pairwise Range		Probabilities						More Likely Value
Events	Ratios	Low	High	Low	High	Average	Final	%	Previous	
D	Base = 1	1.00	1.00	0.10417	0.04546	0.07481	0.075	7	21	1.00
MR	MR/D	2.00	3.00	0.20833	0.13636	0.17235	0.172	17	31	2.30
MB	MB/MR	1.10	1.50	0.22917	0.20455	0.21686	0.217	22	1	1.26
SQ	SQ/MB	2.00	3.00	0.45833	0.61364	0.53598	0.536	54	47	2.47
				<b>1.00000</b>	<b>1.00001</b>	<b>1.00000</b>	<b>1.000</b>	<b>100</b>	<b>100</b>	

**HE** has a more favourable outlook for the **WFS** with a 76% chance for favourable outcomes now compared to 48% previously.

## TAIWAN

This month we focus on the developing events around Taiwan. As stated by the *Economist* recently, Taiwan citizens are more than twice as rich as mainlanders in China. This is similar to the current status and history of the two Koreas, but on a much larger scale. Can the CPC afford to be seen as second to Taiwan economically over the next 10 – 20 years? This will definitely be the outcome if the current status quo is maintained and if the western countries return to normalcy. The relative economic performance of both systems has been proven repeatedly since WW 2. Only a military intervention could reverse the current ranking and subject both the China and Taiwan economies to the one (inferior economically) “system”. **HE** outlines three possible futures for the China/Taiwan situation in increasing order of likelihood:

- **TO**: China takes over Taiwan with a military intervention.
- **IH**: Taiwan faces major increased harassment from China (e.g., blockade) but remains a separate country.
- **SQ**: The current status quo is broadly maintained with US military guarantees in place.

There could possibly be some overlap as between **IH** and **SQ** but essentially Taiwan would continue to operate as a separate country under both scenarios. Possibly there could be some additional restrictions for **SQ** that could reduce its independence to some degree. These scenarios cannot be definitively stated but we will know if/when they occur. Probabilities are outlined in the table following.

**PROBABILITIES ON TAIWAN DEVELOPMENTS OVER THE NEAR FUTURE**

Scenarios		Pairwise Range		Probabilities						More Likely Value
Events	Ratios	Low	High	Low	High	Average	Final	%	Previous	
TO	Base = 1	1.00	1.00	0.19231	0.11765	0.15498	0.155	15	n/a	1.00
IH	IH/TO	2.00	3.00	0.38462	0.35294	0.36878	0.369	37	n/a	2.38
SQ	SQ/IH	1.10	1.50	0.42308	0.52941	0.47624	0.476	48	n/a	1.29
				<b>1.00001</b>	<b>1.00000</b>	<b>1.00000</b>	<b>1.000</b>	<b>100</b>	<b>N/A</b>	

The calculations favour the **SQ** scenario, but **IH** is a significant chance and even **TO** cannot be ruled out with a 15% probability. Future developments are awaited with some trepidation.

## THE WAR IN UKRAINE

**HE** has reworked the options for the war’s outcome as shown below. The order reflects **HE’s** assessment of the relative likelihoods as in least to most likely:

- **RV** : Russian Victory or Russia effectively controls Ukraine.
- **UV** : Ukraine drives Russia out of Ukraine but loses Crimea to Russia.
- **NC** : Negotiated ceasefire with Ukraine possibly yielding some territory to Russia including Crimea.
- **OS** : Ongoing struggle on Ukraine territory.

**PROBABILITIES ON POSSIBLE OUTCOMES TO THE WAR IN UKRAINE**

Scenarios		Pairwise Range		Probabilities						More Likely Value
Events	Ratios	Low	High	Low	High	Average	Final	%	Previous	
RV	Base = 1	1.00	1.00	0.02500	0.01333	0.01917	0.019	2	2	1.00
UV	UV/RV	1.50	2.00	0.03750	0.02667	0.03208	0.032	3	2	1.67
NC	NC/UV	10.00	12.00	0.37500	0.32000	0.34750	0.348	35	28	10.83
OS	OS/NC	1.50	2.00	0.56250	0.64000	0.60125	0.601	60	68	1.73
				<b>1.00000</b>	<b>1.00000</b>	<b>1.00000</b>	<b>1.000</b>	<b>100</b>	<b>100</b>	

Ukraine seems to be holding out and Russia has failed to make significant gains over the last six months. The **NC** outcome would be rational, but Putin does not seem to favour this action. Possibly, a Russian regime change would be a prerequisite for this scenario. Consequently, **OS** continues to have top ranking in likelihood.

Word Count 1071, 1<sup>st</sup> September 2022.