

## Israel - Australia Newsletter

April 2018

Dear Friends,

As Israel's Holocaust Remembrance Day passed by and celebrations for Israel's Independence Day took over, we are exceptionally excited to present our monthly newsletter commemorating Israel's 70 years of independence and 70 years of remarkable (and some would argue miraculous) economic progress, development and achievements.

Within this time, Israel has emerged from being a small, rather poor country to being home to world-class industries, serving as a role model for innovation and creativity, and is now a center of technological, scientific and research excellence. Israel's challenges in being surrounded by hostility throughout its time, whilst also lacking the natural resources Australia is gifted with, makes its achievements all the more remarkable.

Israel is a secondary home to 400 multinational corporations, including Intel, SAP, Facebook, Apple and Amazon - and for many, the only R&D base outside of their home countries. This is because they recognise Israel as a bedrock for innovation: with one of the most educated populations on the planet, a vibrant and innovative tech industry and a globally renowned technology ecosystem, where government, academia, the military and the private sector all work together.

As well as attracting global investment, Israel is also eager to develop partnerships outside its borders, especially in technologies such as: Cyber Security, IoT, Big Data, Blockchain Technologies, Artificial Intelligence, Machine Learning and many more.

We are positive you'll enjoy this unique newsletter which not only refers to the work, industries and projects that the Israel Trade Commission is focusing on but also gives voice and tribute to 70 years of remarkable achievements and great success.

Yom Atzmaut Sameach!

Sincerely,

Shai Zarivitch and the Team  
@ The Israel Trade Commission

Sydney, Australia

In this edition:  
**Israel Celebrates 70 Years This Independence Day | Israel-Australia Agtech Partnerships | Israel Companies @ OzWater 18 | Israel's Industry 4.0 Sector is Grabbing Global VC Attention | Leading News | Business Opportunities | Upcoming Events**

## Israel, the 'Innovation Nation', Celebrates 70 Years on April 19th

Yesterday marked the anniversary of Israel's 70th Independence Day! Israel is celebrating 70 years of nation building, 70 years of aliyah, 70 years in the pursuit of peace and 70 years of building and developing a world-class economy and industry.

### Looking back

After achieving statehood in 1948, Israel faced a deep economic and social challenge in building up the nation's resilience and self-sufficiency. Seventy years ago, Israel's exports focused on lower skilled products like textiles and footwear, and amounted to \$6 million per year. In 2017, total exports reached \$102 billion and the export base has diversified to include more sophisticated, knowledge driven products and services.

For the first three decades, Israel's economy was controlled by the state. With no significant competition and global outreach, its two major industries were agriculture to provide food to its citizens and a defense industry to defend them. Hence the only two well-recognised Israeli brands were Jaffa oranges, a symbol of agriculture excellence, and Uzi machine guns, which were a local pride that developed out of its military needs.

The shift towards developing a high-tech and a knowledge-based economy began in the mid-1980s, following a state of economic crisis. The combination of hyper-inflation, significant debt, skyrocketing unemployment figures and lack of foreign investments brought the economy to the verge of collapse and recession. Subsequently, dramatic restructuring and reforms were introduced to liberalise the economy and currency, and privatise government-owned companies. Israel's market liberalisation coincided with a new wave of skilled migration from Russia and the Soviet Union at the start of the 1990s. Altogether, Israel's transition from a centrally planned economy to a free market model occurred in an extremely short period of time.

The results have been astounding, and feasibility and innovation are now hallmarks of the Israeli state. Despite the odds, Israel has succeeded in building an educated and advanced work force and a competitive global industry. It is renowned as a world-leading powerhouse for technological achievements and excellence on par with Silicon Valley.

### Recent achievements reflect this:

- The World Economic Forum's Global Competitiveness Report 2017-2018 ranked Israel **3rd in the world for innovation** by the World Economic Forum
- Israel has the **3rd largest number of tech companies listed on the NASDAQ**, behind only the US and China, and more than all listed European and Asian firms combined
- In 2017, **112 Israeli tech companies were acquired for an amount equal to \$23 billion**

Israel has also introduced game-changing innovations such as the **Iron Dome** missile defense system, the **Waze** GPS, maps and traffic navigation app, the ubiquitous **USB stick, drip irrigation** and many more.

### Looking forward

Israel will continue to work towards a higher degree of economic integration and freedom, increase foreign investment into its industry, reduce bureaucracy and serve as a center for global innovation and technological excellence.

To commemorate the 70th anniversary of Israel's founding, a series of short videos developed by Israel 70+ and The Hebrew University of Jerusalem take a fun look at future innovations from Israel in **medicine, food, brain science and self-driving cars**.

[Click here](#) for a preview of some disruptive solutions that Israel could be bringing the world in the next seven decades.

8

## What do you think is Israel's crowning invention?

Click on the image for more info on each of these inventions and to vote in The Jerusalem Post's poll at the bottom of the article.

8

[\[Back to top\]](#)

## Israel-Australia Agtech Partnerships



Israel is famous for 'making the desert bloom'. Israeli tomato crops use 40 percent less water than conventional varieties.

Agriculture is Australia's fastest-growing industry and tipped to become Australia's next \$100 billion industry. With so much potential for growth, Australia is looking towards Israel, which has long been recognised for its advanced agricultural technologies, for inspiration and innovation.

Last year, **Advance Queensland** funded a visit to Israel for 11 start-ups to learn from companies that are revolutionising the Israeli agtech scene. Agriculture Victoria also signed a Memorandum of Understanding (MOU) in 2017 with an Israeli company called **AgTech** to develop a new farm management tool for Victorian farmers. The solution will cover every aspect of the supply chain and uses crowd-sourced information to provide key decision making advice on everything from irrigation to crop nutrition to pest control.

In NSW, the establishment of an educational commercial farm in Wagga Wagga that aims to showcase the latest Israeli dairy and agricultural technologies to Australian farmers and foster research collaboration was announced in February 2017. Earlier in 2016, a MOU was signed between the University of Sydney and the Agricultural Research Organisation of Israel to share knowledge and promote collaboration on technological advancements for the livestock, poultry and aquaculture industries.

### Examples of Israeli companies with activity in Australia

**Netafim**, which pioneered drip-irrigation technologies, has been working closely with berry and sugar cane growers in the past half year while **Haifa Chemicals** is a leading supplier of water soluble fertilisers, is the largest supplier of nutrients to the Australian almond industry, as well as to other horticultural crops. **Netafim** and **Haifa** have also been active in hosting workshops for Australian avocado growers.

An interesting Israeli start-up called **Roots (ASX:ROO)** is also seeking to work closely with Australian growers. **Roots'** technology keeps the crops' root zone warmer, in a stable and favourable range throughout the year. **Roots** is part of a trend of Israeli companies that have recently listed on the ASX.

5



We will be sharing more updates and learnings from Israel in our next edition, which will follow on from our agtech trade mission to Israel.

5

[\[Back to top\]](#)

## Israeli Companies @ OzWater 2018



Israeli watertech is spearheading the shift towards sustainable water management through a broad range of technologies: in irrigation, water network management, wastewater treatment, desalination, and water safety and security.

The following companies will be exhibiting advanced and disruptive solutions at **OzWater** in Brisbane from the 6th-10th of May.

### Aquarius Spectrum

Aquarius Spectrum provides advanced leak-detection solutions for water loss reduction, burst prevention, pipe condition assessment, and maintenance and operational cost optimisation.

### Bermad Technologies

Bermad provides high-quality hydraulic control valves. Incorporating advanced flow-control technologies, the company's solutions have proven themselves at every level of the irrigation, water works, and fire protection industries.

### Fluence

Fluence was established with the vision of becoming a leading global provider of fast-to-deploy decentralised and packaged water and wastewater treatment solutions.

### HydroSpin

HydroSpin's innovation produces micro-energy from generators within urban water pipelines, allowing cities to manage their smart water networks with sustainable, efficient and uninterrupted data flow.

### Mapal

Mapal Green Energy's cost-effective Floating Fine Bubble Aeration (FFBA) system is designed to deliver efficient aeration in municipal and industrial waste water treatment plant (WWTP) lagoons and biological reactors at every scale of operation.

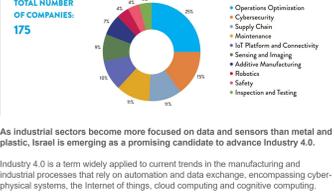
### TaKaDu

TaKaDu's integrated water network solution for utilities analyses raw data from multiple sources in order to detect and manage the full life cycle of network events, including leaks, bursts, and faulty assets.

8

[\[Back to top\]](#)

## Why 11% of Industry 4.0 Global VC Funding Goes to Israel



As industrial sectors become more focused on data and sensors than metal and plastic, Israel is emerging as a promising candidate to advance Industry 4.0.

Industry 4.0 is a term widely applied to current trends in the manufacturing and industrial processes that rely on automation and data exchange, encompassing cyber-physical systems, the Internet of things, cloud computing and cognitive computing.

Israel is an attractive place to invest in this field due to its strengths in developing cybersecurity and predictive maintenance solutions, which are essential technological pillars of the new industrial world, could lead to creative spillover into the industrial manufacturing sector and indeed is behind the growth of Israel's flourishing automotive technology industry.

Israel has approximately 150 innovative companies that target industrial sectors. Some promising companies identified by 'Start-Up Nation Central' include:

### Consumer Physics

Consumer Physics has developed a pocket-size molecular sensor that reads materials' chemical composition, in order to control product quality across the entire production line.

### Clarity

Clarity extracts critical information from real-time monitoring and distils it into actionable insights for securing and optimizing complex industrial control environments.

### Nurego

Nurego monetizes industrial technology companies that are transitioning to a cloud-native environment.

### Plataine

Plataine provides production software for manufacturers, leveraging IoT and artificial intelligence technologies.

### Vayyar

Vayyar has developed a 3D imaging sensor that penetrates through different materials, facilitating quality assurance and site safety, and identifying water leakage, among other applications.

In 2014, Israel attracted 6.9% of global VC funding for industry 4.0 start-ups, and for 2017, the projected figure is 11%. Not only does this place Israel second in the world after the US for attracting VC funding for industry 4.0 start-ups, but it also clearly indicates that, as a nation, Israel is an emerging force and power in this industry.

[Click here](#) to download an infographic on Israel's Industry 4.0 sector.

[Click here](#) to download The Value Proposition of Israel to Industry 4.0 report, by Start-Up Nation Central and Deloitte Israel.

8

[\[Back to top\]](#)

## Links to Interesting News from Israel

- Palo Alto Networks Buys Israeli Cybersecurity Co Secco For \$100M
- Medtronic to buy Israeli co Visiosense for \$75m
- Israel's Next 70 Years: A Look At Future Innovation In Medicine, Food, Self-Driving Cars, And Brain Science
- Israel's Sim Lavi Is Taking With Huawei To Develop Blockchain Smartphone
- Israeli Startup Freezing Cancer In Its Tracks Now Tackling Kidney, Liver, Bone Tumors