

## ISA NEWSLETTER N°17, June 2024

### International Sunflower Association

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## Editorial

*The life of the ISA is moving on, and the time is approaching for the 21<sup>st</sup> Sunflower Conference, which will take place from August 21<sup>st</sup> to August 24<sup>th</sup> in Wuyuan, Inner Mongolia. Once again, the conference will provide an opportunity for members of the global sunflower community to meet, this time focusing on the dialogue between oilseed and confectionary sunflowers, to enable researchers and the industries involved in these two subtypes of the species to benefit from each other's progress. And all this in the heart of one of China's main sunflower production basins. The conference will also be an opportunity to honour major contributions to sunflower research and development around the world at the Pustovoit Awards ceremony.*

*Come one, come all to share your work.*

*Another important piece of news, which is sure to delight many in the sunflower scientific community, is the transfer of the journal HELIA to the ISA, which will now have to ensure its continuity for the benefit of all.*

*Etienne Pilorgé, ISA General Secretary*

## Activity and News of the association

### 21<sup>st</sup> International Sunflower Conference, Wuyuan, China Inner Mongolia

The main theme of the 21<sup>st</sup> ISC is “Only Sunflowers Towards the Sun - Foster Dialogue Between Oilseed and Confection Sunflower”. It will place on next August 21<sup>st</sup> to 24<sup>th</sup>.

The conference initially scheduled at Bayannoer, China Inner Mongolia, will take place at Wuyuan, one hour distant, at the heart of the sunflower production area.

All practical information is available on the conference website <http://www.esanrui.com/isc>

Abstract submission will close on June 30<sup>th</sup> (see <http://www.esanrui.com/iscsubmission> ).

### ISA General Assembly

The next ISA General Assembly will take place in Wuyuan, China, at the time of the Sunflower Conference. Detailed information will be sent to ISA members.

### HELIA journal

The Serbian Academy of Sciences and Arts of Serbia, Novi Sad Branch, and ISA signed a contract transferring to ISA the ownership and publishing right of the journal HELIA, the ISA NEWSLETTER No.17, June 2024



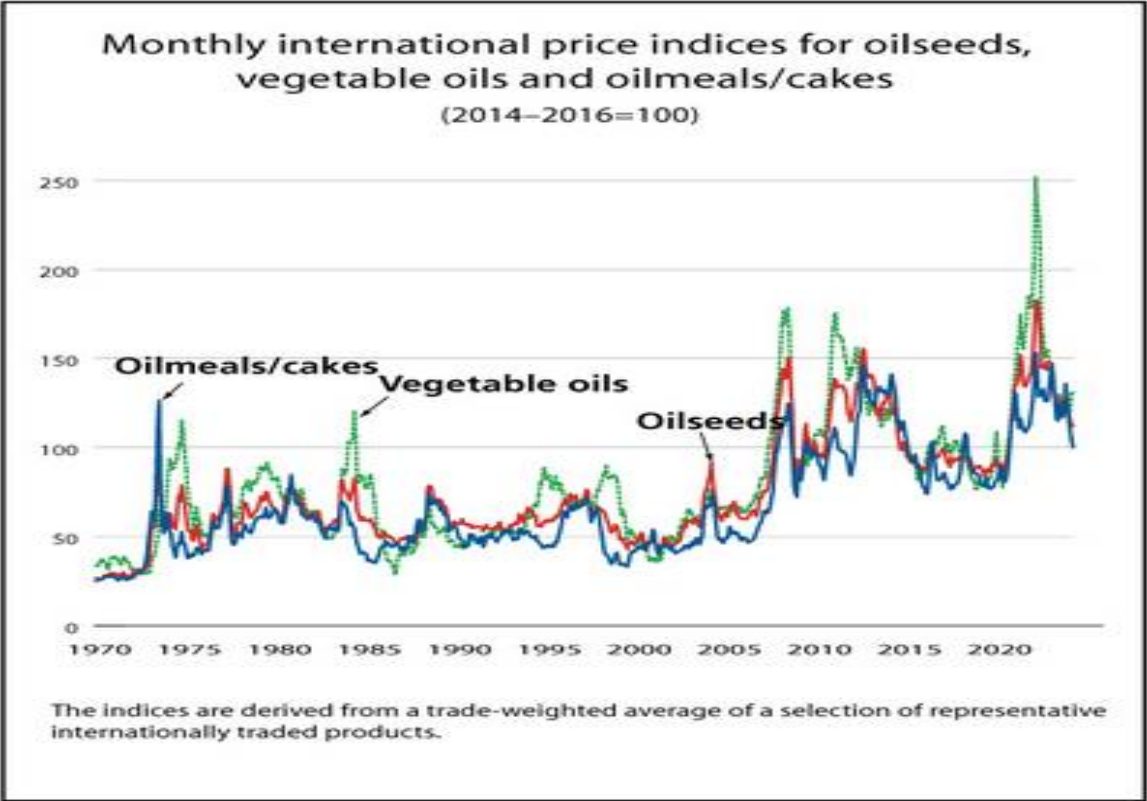
historical journal of the sunflower community. This has been made possible by the strong involvement of the Editor of the Journal, Prof Dragan Skoric, and managing director Zvonimir Sakac, after termination of agreements with publisher De Gruyter, at the end of 2023. We would like to express our sincere thanks on behalf of the ISA. The new HELIA will be published in open access. Further information will be given through the website as soon as the new organization will be settled.

## Value chains and regional news

### FAO vegetable oil price: Global vegetable oil prices stabilized

In April 2024, FAO price indices\* for oilseeds and oilmeals declined for the fifth consecutive month, down 1.0 and 4.1 points (0.9 and 4.0 percent), respectively, and both indices remained below their year-earlier levels. By contrast, the vegetable oil price index marginally strengthened by 0.3 points (0.3 percent) from March, marking the first year-on-year increase since August 2022.

As for the vegetable oil price index, the marginal increase reflected the net effect of higher sunflower and rapeseed oil quotations, more than offsetting slightly lower palm and soyoil prices. International sunflower and rapeseed oil prices kept rising, underpinned by, respectively, continued firm global import purchases and concerns over unfavourable weather conditions for winter rapeseed in parts of Europe.



Source/ read more on [FAO website Markets and trade](#)

### Sunflower world estimates

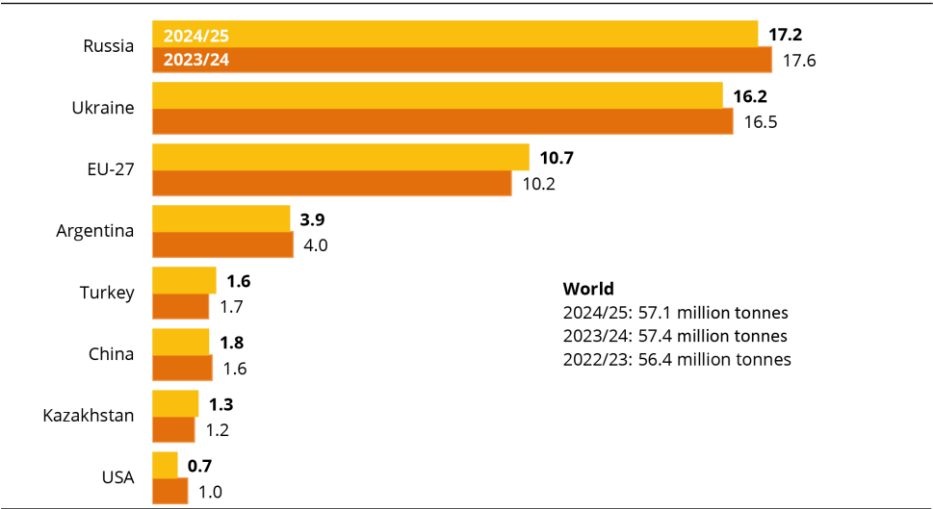
In its latest forecast the International Grains Council (IGC) expects smaller harvests in Russia and Ukraine. Consequently, 2024/25 global sunflower seed output of 57.1 million tonnes is seen to remain below the previous year's record of 57.4 million tonnes.

In April 2024, IGC saw world production at 58.1 million tonnes. The reason for lowering its expectations is that above-average yields are expected to compensate for the decline in acreage only partially. Production is anticipated to fall approximately 300,000 tonnes short of the previous year's record volume.

According to investigations conducted by Agrarmarkt Informations-Gesellschaft (mbH), the main reason for the downward adjustment is expected smaller harvests in Argentina, Russia and China. However, the forecast for Argentina is quite vague at this point because sowing operations are not due to begin for another three months. The IGC expects the low-price level and ample global supply to lead Argentine farmers to scale back their sunflower seed acreages. Also, the La Niña weather phenomenon could impact the yield potential. Russian production is seen to amount to 17.2 million tonnes, down around 200,000 tonnes from the April forecast and down 1.1 per cent from 2023/24. Consequently, the country is set to remain the world's number one supplier of sunflower seed.

As regards the EU-27, the IGC has left its previous month's forecast of 10.7 million tonnes - 500,000 tonnes more than a year earlier - unchanged. The same applies to Ukraine. However, the Ukrainian harvest is likely to decline 300,000 tonnes to 16.2 million tonnes. Due to a sharp drop in sunflower seed area in the Dakota states in the US, which states account for approximately 80 per cent of the US sunflower area, production in the US is likely to be around 100,000 tonnes lower than forecast in April, reaching 700,000 tonnes. This would be a 28.3 per cent decline on the running season and the smallest harvest in 48 years.

Harvest estimate for sunflower seeds  
in million tonnes



Source: IGC

Note: 2023/24 estimate, 2024/25 forecast

Source UFOP chart of the week 22 2024: [https://www.ufop.de/english/news/chart-week/#kw22\\_2024](https://www.ufop.de/english/news/chart-week/#kw22_2024)

### China approves gene-edited wheat

China has approved the safety of gene-edited (GE) wheat for the first time. The move came at a time when the country was moving cautiously towards the commercial-scale production of genetically modified (GM) food crops. Although China had increased approvals of higher-yielding and insect/herbicide resistant GM corn and soyabean seeds in the past year in a bid



to secure its food security, uptake remained slow and cautious due to concerns about the impact on human health and ecology. The approval for GE wheat was seen as a milestone, as the ingredient – used to make pasta, noodles and bread – is mainly grown in China for food consumption, the report said.

**Source: OFI magazine from Reuters May 8. Read more on:**

<https://www.ofimagazine.com/news/china-approves-gene-edited-wheat>)

## Sunflower in Canada

An interesting paper about Canada's sunflower can be found in the US National Sunflower Association The Sunflower Magazine, March 2024 (<https://www.sunflowernsa.com/magazine/articles/default.aspx?ArticleID=4108>) summarizing the crop history in Canada. Sunflower is presently grown on approximately 32000 ha, mostly in Manitoba, with a majority of oil types (80%)

## Press release: A Roadmap for Plant Genome Editing. A perspective from Europe and beyond.

Editors: Agnès Ricroch, Dennis Eriksson, Dragana Miladinović, Jeremy Sweet, Katrijn Van Laere, and Ewa Wozniak-Gientka. Published by Springer Nature. ISBN 9783031461491

Free access on: <https://link.springer.com/book/10.1007/978-3-031-46150-7>

At the book launch the chief editor Prof Agnès Ricroch says “This book will be of value to a wide audience including those wishing to develop a broader knowledge of Genome Editing as well as those wanting a deeper understanding of the science.” She also thanked the European Cooperation in Science and Technology (COST) program for their support through the **COST Action PlantEd** (CA18111) and she acknowledged the contributions from numerous scientists in PlantEd and the Editorial Board. Further information on the EU COST is available at <http://www.cost.eu/>

Genome Editing (GE) is a new genetic technique for improving plants so that they are more adapted to future challenges, such as increased demand for food production, climate change, use of less water, fertilizers and pesticides, and less land availability. GE involves targeted modification of genes within plants so that their expression is changed. It is a research and breeding method that directs and controls genetic mutations and differs from transgenic genetic modification (GM) in that foreign genes are not present in the product.

Using GE in plant breeding facilitates improved crop yields, enhancement of levels of beneficial nutrients, increased resistance to pathogens and pests, and higher tolerance to environmental stresses such as drought and heat. These tools can help increase the sustainability and resilience of the food systems and support the goals of the European Green Deal and the Farm to Fork Strategy.

This book, written by 77 authors from 21 countries, gives an overview of the different methods of plant GE, such as Crispr-Cas and other site directed nucleases. Also, the application of GE to improve the yield, quality or resilience of different agricultural, horticultural and forestry crops is discussed. In addition, the book contains chapters describing the regulations of New Genomic Techniques (NGTs) in the European Union and many other countries and advocates appropriate science-based regulatory approaches for GE. Furthermore, societal and consumer attitudes are considered.

Notes: The COST Action PlantEd involved 620 scientists from organizations in 38 European and 13 non-European countries. The program included consideration of recent advances in

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GE technology, novel and existing applications in crop plants, biosafety, socio-economic implications and communication issues. A more detailed description of the PlantEd COST action is available at <https://plantgenomeediting.eu/> and [http://www.cost.eu/COST\\_Actions/ca/CA18111](http://www.cost.eu/COST_Actions/ca/CA18111)

## Scientific news

### Publications

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Drozd, S., Kussul, N., & Yailymova, H. (2024). Evaluating the Impact of Armed Conflict on Agricultural Sector in Ukraine through Remote Sensing and Machine Learning (No. EGU24-10494). *Copernicus Meetings*. <https://doi.org/10.5194/egusphere-egu24-10494>

Qadir, A., Skakun, S., Becker-Reshef, I., Kussul, N., & Shelestov, A. (2024). Estimation of sunflower planted areas in Ukraine during full-scale Russian invasion: Insights from Sentinel-1 SAR data. *Science of Remote Sensing*, 100139. <https://doi.org/10.1016/j.srs.2024.100139>

## Coming international and national events

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**8 - 10 July 2024, Bologna, Italy: 5<sup>th</sup> International Symposium on Lipid Oxidation and Antioxidants - 5th ISLOA**

<https://veranstaltungen.gdch.de/microsite/index.cfm?l=11650&modus=>



**20 - 24 August 2024, Bayannur/China: 21st International Sunflower Conference**

<http://www.esanrui.com/isc>



**26 – 30 August 2024, Rennes/France: 18th Congress of the European Society for Agronomy**

<https://events.institut-agro.fr/event/1/>



**1 – 5 September 2024. Lisbon/Portugal: 35<sup>th</sup> AAIC Annual Conference: Constructing a Sustainable Future - The Role of Industrial Crops and Products.**

<https://aaic.org/35th-annual-conference/>

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**10 – 11 September 2024, Dresden/Germany: 19<sup>th</sup> Meeting of the IOBC-WPRS WG “Integrated Control in Oilseed Crops (ICOC) & Clubroot Workshop**

<https://iobc-wprs.org/meeting/iobc-wprs-wg-icoc-2024/>



**16 - 20 September 2024, Novi Sad/Serbia: 14<sup>th</sup> Conference of the IOBC/WPRS Working Group on the "Integrated Protection of Stored Products (IPSP)"**

organized by the Institute of Field and Vegetable Crops, National Institute of the Republic of Serbia (IFVCNS). More details can be found on the Conference website

<https://iobc-ipsp-ns2024.com/index.php>





**23 - 27 September 2024, Virginia Beach, VA, USA: ISTRO International Soil and Tillage Research Organisation Conference**

<https://www.arec.vaes.vt.edu/arec/eastern-shore/istro-2024-22nd-conference.html>



**27 – 30 April 2025, Portland, Oregon/USA: AOCs Annual Meeting & Expo**

**29 June – 2 July 2025, Québec City/Canada: International Society for the Study of Fatty Acids and Lipids**

**12 – 15 October 2025, Leipzig/Germany: 20<sup>th</sup> Euro Fed Lipid Congress and Expo**

***We invite everyone who read this newsletter to share information with the Sunflower community.***

*Let us know the scientific projects, events organized in your country, crops performances or any information of interest for sunflower R&D.*

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## **Join ISA**

### **Why should you join ISA?**

*You are interested in sunflower research and development,  
You wish to share points of view and exchange information with colleagues from all over the world,  
You wish to be kept informed of the latest news about sunflower,  
You will benefit from premium registration fees to attend our International Sunflower Conferences and Sunflower Symposia.*

Please go to <https://www.isasunflower.org/register> ,  
Or send a message to [contact@isasunflower.org](mailto:contact@isasunflower.org)

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