



BASF's innovation platform on extraction & processes yields first results: new anti-aging active Oligolin™

- Following innovation platforms on epigenetics and microbiome, BASF's new research platform is focusing on extraction and processes
- New extraction process to obtain hydrolyzed flaxseed extract concentrated in oligosaccharides
- BASF's new anti-aging active Oligolin stimulates epidermal cell differentiation, epidermis thickness and dermal fiber synthesis for a firmer and better hydrated skin
- Oligolin is recommended for natural concepts

Duesseldorf, Germany – April 4, 2017 – Following innovation platforms on epigenetics and microbiome, BASF has created a third research platform on extraction and processes that already produces results. Experts from BASF's R&D department for bio-actives in cooperation with experts from the University of Reims and their Technology Transfer Office SATT Nord have developed a new antiaging active ingredient. They have uncovered the benefits of flax seed oligosaccharides for the skin – that is, their unique capacity to act on tissue structure and prevent skin aging. Oligolin™, a hydrolyzed linseed extract concentrated in oligosaccharides harnesses the rejuvenating powers of flax, a crop cultivated for millennia because of its numerous health benefits.

Innovation platform for highly efficient extraction processes

BASF is a long-standing expert in obtaining extracts from plant material. For many years, the company's specialists for bio-actives have been testing a broad range of plants to transfer their hidden April 4, 2017 P171/17e Birte Kattelmann-Jagdt Phone: +49 2173 4995 464 birte.kattelmann@basf.com

BASF SE 67056 Ludwigshafen Phone: +49 621 60-0 http://www.basf.com Media Relations Phone: +49 621 60-20916 Fax: +49 621 60-92693 presse.kontakt@basf.com Page 2 P171/17e

power to human skin. To strengthen the existing expertise, BASF has decided to invest in an innovation platform for extraction and processes: "We aim at selecting the richest sources and precisely extracting the relevant molecules to enhance the efficacy of our active ingredients. In an increasingly regulated environment, we consider this as a fantastic source of innovation", said David Hérault, head of Global Research and Development for Bio-actives. "Investing in these sustainable processes already paid off: We created a collection of unique solutions that answer consumers' quest for efficacy and growing awareness about how precious nature is. Oligolin is one of them."

Oligolin™: firmer and better hydrated skin within 28 days

Oligolin enhances the build-up of glycosaminoglycans (GAGs) that are part of the connective tissue, and inhibits the expression of hyaluronidase and heparanase. Stimulating epidermal cell differentiation, and epidermis thickness, Oligolin contributes to a better hydration of the skin. The dermal ground substance and fiber synthesis are boosted and the skin revitalized. The efficacy of Oligolin was substantiated through in vitro and in vivo tests on the different skin compartments and on key biological targets linked to epidermis alteration and dermis depletion occurring with age. Applied at 1 percent, the active ingredient improved skin hydration by 11 percent after 28 days. Within the same period, it improved skin firmness by 14 percent.

100 percent renewable-based and recommended for natural concepts

Oligolin is manufactured from flaxseeds cultivated in France. This hundred percent renewable-based active ingredient without preservatives is Cosmos approved. Oligolin can be cold-processed at room temperature. Recommended for natural concepts, it is suitable for the use in cosmetic products such as rejuvenating face creams, moisturizing and firming serum treatments, and multi-functional rejuvenating cures at every skin level.

Page 3 P171/17e

About the Care Chemicals division at BASF

The BASF division Care Chemicals offers a broad range of ingredients for personal care, hygiene, home care, industrial & institutional cleaning, and technical applications. We are the global leading supplier for the cosmetics industry as well as the detergents and cleaners industry and support our customers with innovative and sustainable products, solutions and concepts. The division's high-performance product portfolio includes surfactants, emulsifiers, polymers, emollients, chelating agents, cosmetic active ingredients and UV filters. Superabsorbent polymers developed for the full spectrum of hygiene applications complete the range. We have production and development sites in all regions and are expanding our presence in emerging markets. Further information is available on the Internet at www.care-chemicals.basf.com.

About BASF

At BASF, we create chemistry for a sustainable future. We combine economic success with environmental protection and social responsibility. The approximately 114,000 employees in the BASF Group work on contributing to the success of our customers in nearly all sectors and almost every country in the world. Our portfolio is organized into five segments: Chemicals, Performance Products, Functional Materials & Solutions, Agricultural Solutions and Oil & Gas. BASF generated sales of about €58 billion in 2016. BASF shares are traded on the stock exchanges in Frankfurt (BAS), London (BFA) and Zurich (BAS). Further information at www.basf.com.