

separation & process

**GERMANY AUSTRIA** INDIA EDIBLES CHEMICALS **GERMANY - BAVARIA EMIRATES ENVIRONMENTAL TECHNOLOGY** 



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#### Dear Customers and Readers,

Many of you will possibly receive this edition of HILLER News during or shortly after the **IFAT 2012**.

The fair's size and focus on environmental issues mean that it will be one of the main events for us this year, as dewatering of various sludge types from sewage and waste-treatment systems traditionally represents one of the biggest markets for decanters.

This being the case, our new decanter model **DP484** was presented for the first time as a prototype at the IFAT 2010. Now, just one and a half years later, the first machines are already in use and serial production of the series is underway. A long development process has therefore come to a successful end, and I am glad to see that all the ideas and improvements from the design and prototype phase have been incorporated into the production model.



Our new **DecaPress** is now setting the standard for quality and performance in all areas, while at the same time, as mentioned at the presentation of the prototype, maximizing robustness and operational stability.

But of course, the development work doesn't stop there. Our new decanter concept will now be incorporated into the different sizes, and work will begin on the next stage of the concept: namely the new DecaPress as the basis for the many derived models - olive oil, drilling fluid, 3-phase, explosion-proof, etc.

Like the platform concept in the automotive industry, our new decanter generation will enable us to have a very wide range of products. In addition, maximizing the number of identical components will maximize both economic efficiency and the availability of spare parts.

Our guiding principle in the future will continue to be to offer our customers solutions that are perfectly tailored to their needs and which are commercially viable in the long-term.

We are happy to discuss with you how we can accomplish this together in practice. You will always find us willing to listen to your wishes and requirements, and we will do our utmost to fulfil them.

I therefore look forward to welcoming you at one of our trade fair stands.

With best wishes from Bavaria and "Vergelt's Gott!" - our way of saying "Thank you!".



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# Use of the new generation HILLER centrifuges at the WWTP Lemgo



Centrifuges have been used to dewater sludge at the **WWTP Lemgo** for several years.

In 2011 it was decided to install a modern, highperformance centrifuge alongside the existing, ageing decanter from one of our competitors.

After impressing the plant managers with excellent trial results and a very competitive price, the client decided to award the contract to **HILLER GmbH**.

An order was placed for the new **HILLER DP484** centrifuge, which features innovative drive technology combined with outstanding process engineering.

After six weeks' construction time, the centrifuge was

taken into operation.

All contractual guarantees were met during the commissioning phase.

The WWTP is therefore very satisfied, hence, not at

least due to the reason that all open questions in regard to the new centrifuge type have been settled with the customer from the very first.

Our specially-developed centrifuge control system, called SEE-Control, enables easy operation combined with wide-ranging possibilities for the statistical recording of machine data.

#### The process parameters:

up to 900 kg DS/h, discharge up to 30% DS with very good separation performance, i.e. optimal centrate quality at a high capture rate.

For questions regarding operational safety, reliability and process parameters, please contact plant manager Mr. Klaus Arnold, Tel. +49 (0) 5261-965911.

If you are interested in a site visit, please contact us!

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## Highest German award for ORO juice

At the end of 2011, the Federal Ministry for Food, Agriculture and Consumer Protection awarded the Federal Award for Fruit Drinks to ORO Obstverwertung, which is based in Rohrdorf.



**»ORO**« is an ultra-modern fruit juice producer. It uses a **HILLER** decanter to produce apple juice in a vacuum, which results in the juice containing more valuable ingredients than with existing, partly-open pressing systems.

The freshly-pressed juice is processed immediately after the centrifuge procedure is completed.

The juice is flash pasteurized at 90° Celsius and kept at this temperature in a heat-holding zone for 90 seconds. This is enough time for sterilization.

It is then reverse cooled to storage temperature (15 to 25° C) and stored in large-volume tanks. Later on, the juice is bottled, without adding any additives.

This results in a unique taste experience. In particular, the naturally cloudy apple juice creates an extremely "soft" and "smooth" impression on the palate. It is the larger percentage of fine pulp that creates this taste sensation.

Moreover, centrifugal juicing and closed raw juice processing affects fewer ingredients and health-promoting antioxidants are retained.



## From sugar beet to syrup

### HILLER decanter technology in sugar-beet syrup production

As a sweet spread, a baking ingredient for pumpernickel bread or a cooking ingredient for sauces - sugar-beet syrup is universally popular and in demand.

The family-owned sugar-beet syrup manufacturer **Nienaber**, based in Wadersloh-Liesborn in North Rhine-Westphalia, has been producing sweet-smelling sugar-beet syrup for 80 years, with **Klaus and Hildegard Nienaber** the fourth-generation to run the company. We recently interviewed them:



#### How will the centrifuge be used in your company?

First, the sugar beets, which are supplied by regional farmers, are washed and gently cooked in steam pressure boilers. After around five hours the sugar beets have been transformed into a pumpable beet pulp, which is then gently juiced by the **HILLER DCH37-422** centrifuge.

We dispense with enzymatic preparation of the product completely.

The extracted beet juice is then thickened in a vacuum system and the resulting solid collected and used as a powerful food supplement for own livestock, and is also sold to local farmers.

During the approximately three-month production period, around 200t of syrup is extracted from each 1,000t of sugar beet.

#### What are the advantages of the HILLER centrifuge?

Before purchasing the centrifuge, we processed juicing using a hydraulic basket press. The **HILLER** centrifuge enables us to have an ongoing and operator-friendly production process, which runs from late September to early January.

One big advantage is the CIP cleaning device, which allows us to automate the cleaning process and thus deploy 50% less manpower requirement.

The closed system and extremely high-quality design of the decanter also allow us to achieve a very high hygiene standard.



## Are you satisfied with the centrifuge and the support provided by HILLER?

We are very happy with the performance of the **HILLER** centrifuge. The machine has now been running smoothly for more than 1000 hours and the final product tastes fantastic.

We have been very well looked after right from the start by the **HILLER** team and look forward to continuing to work with them.



# Trade fairs over the years

## **HILLER** - present world-wide for many decades!

1972

Trade fairs, also known as exhibitions, have always been and will always be a reflection of a country's economic situation. Nowadays there is a trade fair for almost everything, from angling to zookeeping.



Spectacular fairs such as the Paris Air Show in Le Bourget illustrate the importance trade fairs have today in our economic life.

HILLER GmbH too has been attending several of the world's most important trade fairs for decades.

From the FERIA DEL OLIVO trade fair in the Spanish town of Montoro, which focuses on olive oil production and processing, to the **IFAT** in Munich, the leading trade fair for waste water and environmental engineering.

HILLER GmbH actually started quite differently. It was founded in 1971 as a design office, but first started manufacturing decanter centrifuges in 1973.



Housed in an airdome, visitors were able to experience the quality of our workmanship at first hand.

Sales activities were organized at the time by our exclusive distributor KHD Humboldt Wedag, but as early as 1978 HILLER GmbH was represented under its own name at the industry trade fair in Thessaloniki.

In 1999 came the big change:

with its **DO37-363** decanter.

HILLER exhibited for the first time under its own name and with its own stand at the IFAT in Munich, and was literally overwhelmed by visitors to its stand.

**HILLER GmbH** subsequently began establishing itself in other areas, as highlighted by its presence at ACHEMA, the chemical industry's leading trade fair. HILLER GmbH exhibited there for the first time in 2000

Other high-profile trade fairs followed, at home and abroad, with each stand including an exhibit suited to the fairs focus.

At INTERVITIS trade fair in 2004, a separator as an additional processing step was presented to an interested

audience for the first time.

But HILLER GmbH also regularly attends non-European trade fairs, usually exhibiting on a joint German stand in order to underline the Made in Germany aspect to its products.

In all the years we have attended trade fairs, we have always remained true to our philosophy:

Which is to provide application-specific advice at the highest level coupled with human and intercultural understanding of the needs and concerns of our customers and friends.



(Industry trade fair in Thessaloniki)



(IFAT, Munich)



(Intervitis, Stuttgart)

2012

(Photo: AFP)

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# WWTP BRESSO: 2008 to 2011 - installation of two HILLER DP66 models



The wastewater treatment plant in Bresso commenced operation in 1991 (more than twenty years ago) and is spread over an area of 150,000 m². It is located in the North of the municipality of Milan. The plant serves five municipalities in the province of Milan. These are Bresso, Cinisello Balsamo, Cormano, Cusano Milano and Paderno Dugnano.

The plant has a nominal design capacity of approximately 300,000 PE. The actual number of habitants covered is 215,000, of which 84% is made up of non-industry usage (with 65,000 cubic meters of average daily flow).

The wastewater treatment plant is fed via two main pipelines that are connected to the different municipal sewers.

In recent years the plant has been under modernisation in order to meet the requirements set by law for WWTP's on the scale of more than 100,000 PE. In the planning phase for the related renovations and extensions included was also a change in the dewatering stage for which chamber filter presses had been considered by the WWTP's consultants.

The customer could be convinced that the installation of a decanter would have several advantages compared to the originally scheduled filter presses.

**HUBER TECHNOLOGY Srl., HILLER's** Italian sales and service partner, received the order for the supply of one **DP66-422 HY** sludge dewatering decanter and the corresponding plant equipment in 2008.

The installation of the decanter has made it possible to obtain sludge with high dry matter content (approximately 30% on average), whilst at the same time reducing the whole sludge produced. This in turn means a reduction in disposal costs.

According to the tender the **WWTP Bresso** was given the opportunity to order a second sludge dewatering line from the same supplier.



The excellent results from the first decanter installation had had a big influence on the decision of the **WWTP Bresso** to engage **HUBER TECHNOLOGY Srl.** also with the delivery of the second sludge dewatering line.

The commissioning and start-up of the second unit, including the final testing stage, took place at the end of 2011.

The sludge dewatering system with two **DP66-422 HY** at the **WWTP Bresso** is one of the largest installations in Italy.

## Success with new OV53 eco<sup>2</sup> decanter line



In October 2011 **EKEM S.A.**, the exclusive sales partner of **HILLER** in Greece and Cyprus, successfully strengthened their presence in the Cypriot market. In defiance of the common economic situation another olive oil extraction plant has been installed last autumn. Precisely the local agricultural sector contributes the export and consequently sustains the countries economic power.

The HILLER olive oil decanter OV53 eco² was installed in the olive oil extraction factory owned by company KING OF OLIVES LTD, located in Agglisides village, Cyprus. This company is also the market leader for olive oil products in the Cypriot market. Therefore we have every reason for being proud of this successfully handled project.

This was also a great opportunity for HILLER GmbH and EKEM S.A. to demonstrate in practice the advantages of the new series of HILLER pure two phase olive oil decanters, called eco<sup>2</sup>, released at the beginning of 2011. From the very first day of operation, the performance of the decanter OV53 eco<sup>2</sup> was excellent, even succeeded all expectations in regard to the required capacity per hour and the quality of the produced olive oil.

The design of the new eco<sup>2</sup> type machine is orientated to

two key concepts: **ecology and economy,** and hence, this strategic decision of **HILLER GmbH** was eventually crowned with success.

In both, Greece and Cyprus, more and more olive mill owners realize the advantages of the two-phase decanting process and adopt it.



ecology and economy

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#### **HILLER** service safeguarded throughout the US

## HILLER LLC sets up a nationwide repair service with its partner US Centrifuge in the US

Indianapolis-based **US Centrifuge** has been a renowned and respected authority on centrifuges for decades in the US market.

Our local subsidiary **HILLER Separation & Process LLC**, which is based in Lampasas, Texas, and its new partner will together provide a nationwide maintenance and repair service for locally-installed decanter systems.

Throughout our history we have been involved in one way or another in the North American market. Initially, **HILLER** centrifuges were sold via our partner KHD in Cologne, better known in the US as **Humboldt**. Later on, the US company **US Filter**, subsequently **Siemens Water Technologies**, became our long-standing and reliable partner.

The partnership with **USFilter/Siemens** lasted for more than a decade, in which we sold and successfully commissioned more than hundred **HILLER** centrifuges in the US market.

In 2010, Siemens-USA decided to withdraw centrifuge technology from its product portfolio, and our long-standing supply contract was therefore ended by mutual agreement.

Afterwards we faced a big dilemma. We had enjoyed a very successful decade in the US market, and on no account wanted to withdraw from the market.

Our management therefore took the decision to sell its products under the company's own name **HILLER**-centrifuges in the US market.

For this reason, HILLER Separation & Process LLC was founded in 2011 in Lampasas, Texas, as a hundred percent subsidiary of HILLER GmbH. The Managing Director of HILLER LLC, Tony Langley, is a long-time Siemens employee with extensive experience in the field of centrifuges.

One priority for us right from the start was ensuring a flexible and high-quality service in relation to our large, installed machinery in the US. At the same time, we wanted to be able quickly carry out high-quality repairs to our centrifuges to ensure high operational reliability for our existing customers.

The most effective strategy so far has proven to be our twopronged strategy, which we are currently vigorously implementing. First of all, we have created a centrally-located service base in Lampasas, Texas, from which we can service the entire country.



US CENTRIFUGE SYSTEMS

In Lampasas, we maintain an extensive spare parts inventory as well as replacement and mobile units so that we can respond to and resolve service requirements quickly.

In addition, we have acquired a renowned centrifuge technology expert, **US Centrifuge** in Indianapolis, as our repair partner.

As many of our centrifuges are installed in the east of the United States, our new partner **US Centrifuge** is ideally located for providing our existing customers with a high-quality centrifuge repair service.

For some time therefore, the two partners have been engaged in an intense and lively exchange of knowledge, so as to provide the best-possible all-round service in relation to **HILLER** centrifuges.

The fact that **US Centrifuge** has since 2010 belonged to the Indiana-based Dilling Group has been helpful in this respect. The Dilling Group, with six hundred employees, is one of the largest US companies in the field of integrated industrial, mechanical and electrical systems. The Dilling Group sees great potential in the centrifuge repair and service unit. Large sums of money are therefore being invested in Indianapolis in the expansion of repair capacities. **US Centrifuge** is already carrying out its first centrifuge repairs.

We are confident that together with our new partner we will be able to provide a high-quality and fast repair service to all our US customers.



HILLER LLC centrifuge parts warehouse in Lampasas

We are pleased that we are now able to be active in the US market under our own name. This will allow us to make our extensive centrifugal expertise directly available to customers. We sense a tremendous spirit of optimism and energy among all our partners in the US - the kind of spirit that has driven the country's economic success for centuries.

## **News from Russia**

In 2011, the Moscow Refineries opted for a complete system including three explosion-proof **HILLER 3-phase DO45-463** decanters with Backdrive. The system is about to be completed and start-up

will take place in the first half of 2012. This successfully implemented project gives us every reason to be proud because the competition for the contract was really tough.



In recent years, Lukoil and TNK/BP have both placed several orders for HILLER GmbH machine technology.

#### **New Benelux sales office**

Our new **HILLER Benelux Sales Office** is now managed by Mr Frits Nab, who has worked for **HILLER GmbH** for the past six years.

Over the past few years, Mr Nab has established a proven record for himself in the area of industrial sales and marketing activities. In addition, several test runs were completed successfully in 2011.

We wish Mr. Nab every success!

If you have any enquiries, please contact Mr Nab at the following address:

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**NEWS 2012** 





**HILLER** can provide competent solutions for these industries and applications:



Food and beverages







Chemical processing and pharmaceutical industry

Environmental technology





Mining, tunnel construction, mineral raw materials and drilling fluids