

Your specialist for innovative and application-oriented plastic compounds



AKROMID® A AKROLEN® AF-Color® AKROMID® S AKROLO
ID® S AF-Color® AKROLOY® AKROMID® T AF-Carbon® AKROMID® B AF-Complex® AKROLEN® AKROMID® A AF

Innovative, application-oriented pla

AKRODY AKROMID B AF-Carbon AKROMID T AF-Complex
AKROMID T AF-COLOR AKROMID S AKROLEN AKRODY AF-Complex AKROMID A AF-Carbon AKRO

From 1988 to today: Providing customer satisfaction with tailor-made solutions

With the construction of a new, modern production facility in the summer of 2002 and a new addition to the warehouse and administration building completed in 2010/11, AKRO-PLASTIC today keeps pace with the steadily increasing demand and growing requirements for plastic compounding in one of Europe's leading state-of-the-art production facilities.



Since we began operating in 1988, we have grown to some 140 employees and a production capacity of over 50,000 tonnes annually. Our guiding principle has always been individuality. We do not concentrate merely on offering a broad product line ranging from standard compounds to special compounds; much of our focus lies in cultivating a comprehensive expertise in the application-orientated use of polymers.

Since 2004 AF-COLOR, specialist in the manufacture of high-grade technical master batches, has operated as a subsidiary of AKRO-

PLASTIC GmbH under its own name within the Feddersen Group international alliance of companies.

Our customers are global companies and small-scale plastics processors alike. Here custom raw materials are produced on a large scale for big customers such as BMW, Volkswagen, Mercedes, Opel, and ABB as well as in small batches for small-scale processing facilities. But they all have one thing in common: high standards. That's why we're more than just a producer. We see ourselves equally as a service provider. Not only do we continually work to advance our products, we are also

industry trend-setters with our certified Quality Management System and accredited testing laboratory. The sole owner of all companies within the Feddersen Group is the non-profit K.D. Feddersen Foundation, which operates an assisted-living facility and nursing home in Hamburg, Germany. With our earnings, we contribute to a large extent to the work of the Foundation – an aspect of humanity which we also carry over to our daily contact with customers and suppliers, true to the motto of our company's founder, Karl-Detlef Feddersen: "Acting on behalf of people – acting through global trade".

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Ultra High-Tech Production Lines – Investments in the future

Ongoing investment in state-of-the-art plant technology and in-depth training for our employees in all sectors are essential components of our corporate philosophy. This is how we ensure continuous process control for our exacting customers and their demanding products.

Since 2005 we have been successfully represented in China with our own production facility. The original factory between Shanghai and Suzhou, which began turning out products on one compounding line in 2005, could no longer keep pace with the domestic industry's high demand. So at the end of 2010, we began operating a new factory loca-

ted in Wujiang, in the province of Jiangsu. Starting off with two compounding lines, we have now expanded our yearly production capacity to 7,000 tonnes. Additional lines will be added successively. The plant is designed to accommodate growth.



We offer our customers:

- Ultimate production flexibility
- Deliberate focus on specific polymer solutions – individuality is our speciality. This is where we see our best competitive edge: top quality, custom-made for each of our partners. Where others are downsizing their portfolio, we are implementing a strategy of diversity.
- Expertise for the benefit of all: We use the knowledge of application-oriented polymer processing that we have gained through collaboration with global companies to advance smaller customers as well.



- Comprehensive material specifications give our customers the assurance that they will be able to meet the high standards of their clients through consistent quality.

Engineering Plastics²

„Engineering plastics² – for us, that means making use of synergies.“ Together with our sister company and distribution partner K.D. Feddersen GmbH & Co. KG and their international subsidiaries specialised in the sales and distribution of engineering plastics, we are able to draw on comprehensive technical expertise in all aspects of plastics engineering. We utilize the synergies resulting from this partnership to ensure your success.

EP²

Our goal – excellent product quality

AKROMID[®] B AF-Carbon[®] AKROMID[®] T AF-Complex[®]
AKROMID[®] T AF-Color[®] AKROMID[®] S AKROLEN[®] AKROLDY[®] AF-Complex[®] AKROMID[®] A AF-Carbon[®] AKRO

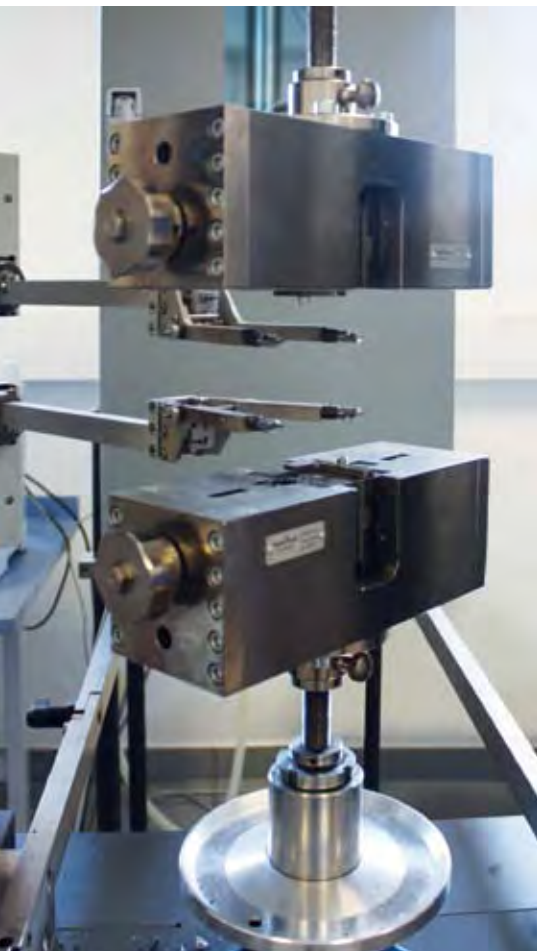
Our certified Quality and Environmental Management Systems

Outstanding quality, satisfied customers, a corporate management policy of environmental stewardship and a healthy work environment for our employees – these are the commitments we do business by and are the pillars of our company's economic success.

We are certified to the following standards:

- ISO 9001 : 2008
- TS 16949 : 2009
- ISO 14001 : 2005
- ISO 14001: 2004 IQNet

These certifications are at the same time part of a comprehensive, Integrated Management System we call AKRO Excellence. The system, established in 2008, also governs the legal matters pertaining to our production sites.



Expert knowledge of material testing and production know-how

As one of few medium-sized providers of plastics production and compounding services, we can also offer you the option of assured materials testing.

You, the customer, benefit from our experienced laboratory staff – experts whose technical knowledge is maintained at a high level through practical work in production environments and ongoing training.

Our test methods have been certified by the Deutscher Akkreditierungsrat (German Accreditation Council) in accordance with DIN EN ISO 17025.



and a clean environment

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From small orders to full service

In the area of toll compounding, we offer a flexible, efficient production environment as well as the high quality standards we have become known for. Our production expertise comprises cutting-edge facilities for strand pelletising and underwater pelletising, as well as twin-screw

extruders featuring variable process lengths. Moreover, we operate two production sites so you can rest assured that all products will be delivered on time and in accordance with the highest quality standards.



Improving our products and developing new solutions

Our research and development work aims to utilise trends and new ideas to serve the needs of our customers. Our experts combine the latest developments from the markets in which we operate with their long-lasting experience to create innovative products. Of course, we do not act alone in this endeavour. To meet our customers'

demands in the best possible manner, we work within a broad network of institutes, research organisations and partner companies.

Our highly developed service expertise in the areas of formulation development and toll compounding serves as a benchmark in the industry. We focus on the product

and its specific requirements. The service package we offer our customers provides solutions that span the entire value chain, increasing productivity and efficiency as a result. This is the approach we take to forge strategic partnerships for the future.

Plant Engineering

In collaboration with our sister company FEDDEM GmbH & Co. KG., we are able to design state-of-the-art turnkey plants tailored to your requirements. We have successfully implemented a compounding plant concept operating on the optimal material flow principle and on this basis, we are able to plan and design turnkey facilities according to our customers' specifications using a team of project engineers. Lean management to run the plant is part and parcel of the package, as are specific customer interests and contractual confidentiality agreements.



Your product requirements – a challenge

AKROMID® B AF-Carbon® AKROMID® T AF-Complex® AKROMID® T AF-Color® AKROMID® S AKROLEN® AKROLDY® AF-Complex® AKROMID® A AF-Carbon® AKRO

From the automotive industry to the sports and leisure business, applications for our products abound in just about every industry. Through our comprehensive application engineering consulting service, you are given the knowledge you need to select the right product, providing you with effective, practicable solutions for your product development needs. Here are just a few of the major market segments in which our customers operate:

Elektro/Electronics

Flame retardant systems, free of halogen and red phosphorous: our AKROMID® FR (Flame Retardant) is up to the challenge. The demands AKROMID®FR must live up to in terms of flame retardancy are stringent. Our product is often used in plugs and contact bridges. Connectors, electronic housings, circuit breakers and capacitor housings are further examples of potential applications.

AKROMID® FR has undergone UL (Underwriter Laboratories) flammability testing as well as glow wire testing, which even encompass the more stringent standards set forth in IEC 60335. Further requirements include compliance with the RoHS Directive and laser printability.



Sports and Leisure

Amateur athletes today expect almost as much from their sports equipment as the professionals do. Our AKROMID® family includes some exceptional products for all types of athletes.

Recent years have seen a growing trend towards the use of high-end materials in sports apparel and

equipment. Whether for ice hockey skates or ski bindings, for home trainers or bicycle components – our extremely impact-resistant AKROMID® HI is an ideal material for a whole host of applications. It's a product that can even be used for safety

equipment such as helmets or protectors.



Challenge we live up to!

AKROMID® A AKROLEN® AF-Color® AKROMID® S AKROLOID® S AF-Color® AKROLOY® AKROMID® T AF-Carbon® AKROMID® B AF-Complex® AKROLEN® AKROMID® A

Automotive

For everything from beauty covers to cylinder head covers, from gear-box components to coolant thermostat housings – with our AKROMID® T and AKROLOY® PA you get two polyamide variants that live up to high standards. Especially in times of rising petrol costs, weight saving is an important topic in the automotive and supply industries. As an alternative to metal, we offer PA 6.6-based AKROLOY® PA, a high-end product that significantly reduces

the characteristic disadvantages of polyamides when used in metal-substitution applications. One such characteristic is moisture absorption, which leads to a decrease in stiffness, strength and creep modulus and results in a lower dimensional stability of the material.

The new AKROMID® T product range based on polyphthalamide (PPA) works exceptionally well in applications where high temperatures

are the norm, such as in the engine compartment of motor vehicles.

For the vehicle interior, we offer high-quality materials such as AKROMID® and with the RM-series, with reduced moisture absorption for high dimensional stability. After all, even inconspicuous components such as trim elements or custom-fit support elements in the instrument panel are crucial aspects of the overall visual impression.



Machine Building/Metal Substitutes

Outstanding chemical resistance combined with excellent mechanical characteristics – these are the primary reasons to use products based on AKROMID® S, AKROMID® T and AKROLOY® PA in machine building applications.

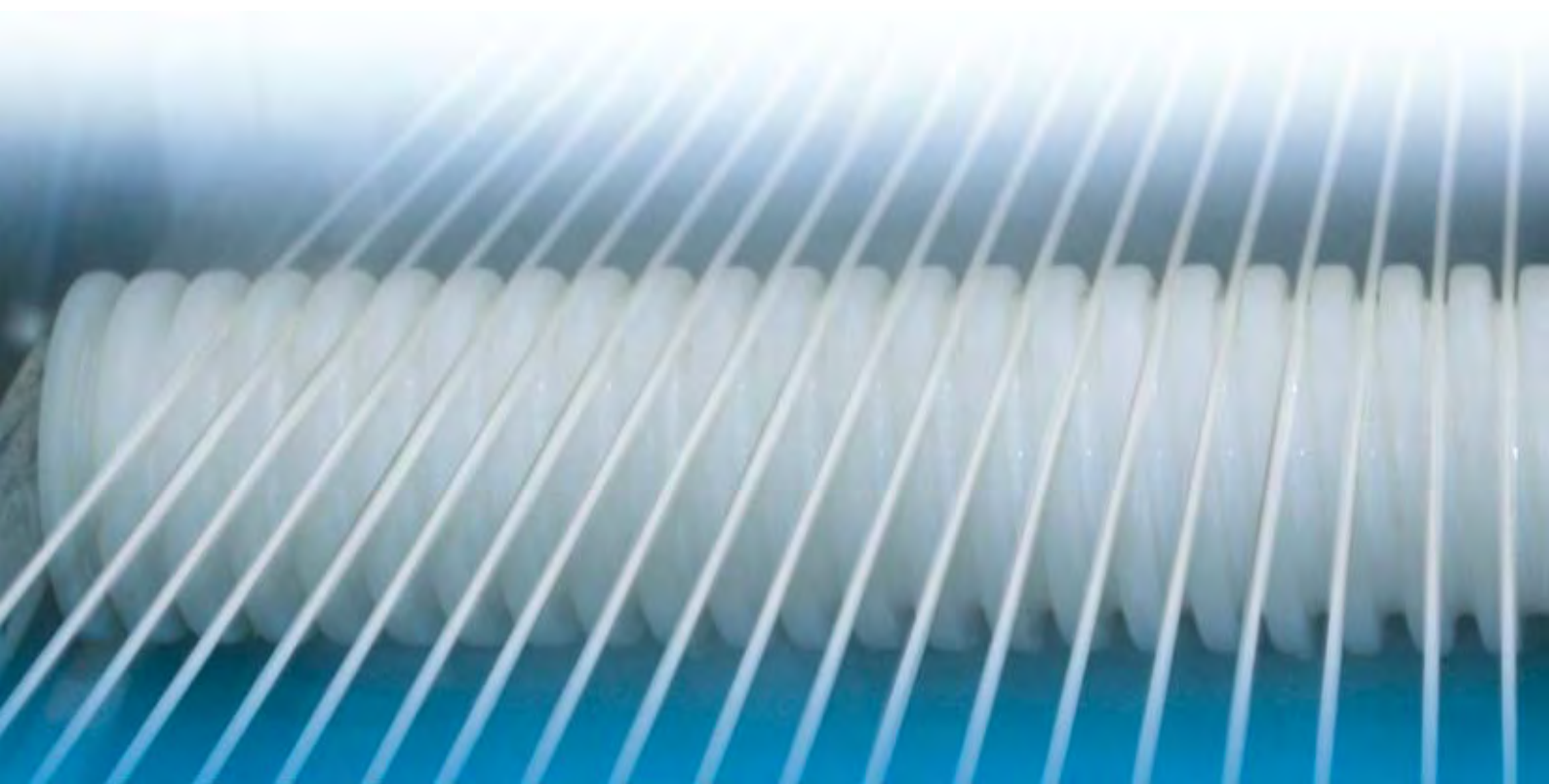
Compared to PA 6 or PA 6.6, AKROMID® S stands out due to its superior resistance to chemicals and hot water. It absorbs 50 % less moisture

and exhibits greater dimensional stability; it also has better cold impact resistance and an excellent surface finish to boot. What's more, it is extremely resistant to highly aggressive media (a 50/50 glycol-water mixture, for example).

The major cost advantages over Aluminium-, Magnesium- or Zinc-based die-casting alloys are another important driving force behind the

switch from metals to plastics. Broad tolerances, which plastics in such applications are often reputed to demonstrate, are a thing of the past. In comparison with die-cast metals, our products stand out for their high dimensional accuracy. They are therefore used even in technically demanding areas such as gear casings, gearwheels, pump and valve elements, or as functional parts in rotating machinery.

**We will be
pleased to meet you!**



AKROLOY® AKROMID® B AF-Carbon® AKROMID® T AF-Complex®
AKROMID® T AF-Color® AKROMID® S AKROLEN® AKROLOY® AF-Complex® AKROMID® A AF-Carbon® AKROMID®

AKRO-PLASTIC GmbH
Member of the Feddersen Group

Industriegebiet Brohltal Ost • Im Stiefelfeld 1 • 56651 Niederzissen • Germany
Phone: +49(0)2636-9742-0 • Fax: +49(0)2636-9742-31
info@akro-plastic.com • www.akro-plastic.com