

Alliance for Safety and Quality



The most important aspect first

Grinding is one of the oldest manufacturing and processing techniques. Metals, plastics, wood, glass, ceramics as well as mineral materials and many others are all worked with **abrasive products**. Therefore, their **production** is today a **key industry**.

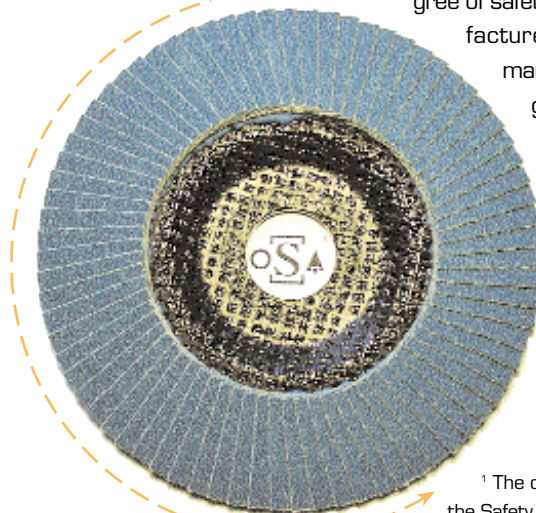
In a host of applications **grinding and cutting-off** need very high peripheral speeds from the rotating abrasive product. **These products must therefore be particularly safe so as to stand up to the extreme mechanical and thermal stresses**. However, the many accidents which result again and again in serious if not in lethal injuries through the use of hand-held abrasive products in industry and, in particular, in the hobby field show that this is often not the case.

Regrettably there are no globally binding safety requirements for abrasive products and also lacking is transparency on product quality on the international markets. For this reason, **user protection and accident prevention** should be one of the most **important corporate objectives** of each and every **manufacturer**.

This is why **responsible manufacturers of abrasive products from a number of European countries set up the Organization for the Safety of Abrasives (oSa)** in 2000. Its members have voluntarily undertaken to produce and market safe and accident-preventing quality abrasive products. These companies are thus setting a clear signal against inferior and dangerous products which even when used properly still represent a real risk in every way.

Even though accidents in industry and at home cannot be completely ruled out, the risk to the user can be significantly reduced when **abrasive products are made to high uniform safety standards** – this is what the oSa members have undertaken to do.

The user recognizes these quality grade products from the oSa trade name.¹ oSa marked products give the user a considerable degree of safety in application. They signify to the manufacturer and trader a reduced liability risk, a market and competitive benefit and an image gain.



¹ The oSa label does not mean that the Organization for the Safety of Abrasives or its institutions assume any liability for the reliability of the designated products

User safety and accident prevention

The most important requirements in **avoiding accidents with abrasives** are safe products, proper operation and adherence to accident prevention steps.

The safety of the abrasive product to be used, whether in metal and wood processing, in cutting stone or polishing synthetic materials or in the industrial as well as private sector, **is of paramount importance**. On the basis of the well-known accident numbers with hand-operated abrasive products in Germany (> 10.000 every year), a number around some orders of magnitude higher is to be presumed world-wide.

Evaluations of the accident statistics from the Institutions for Statutory Accident Insurance and Prevention **show that many of these accidents are attributable to unsatisfactory abrasive quality**. Experts believe that one in three accidents in the industrial and handicraft field is down to poor quality of the abrasive products.

Abrasive products with safety faults put at risk both the ultimate consumer and user. In many instances cut-price products do not comply with in-force safety regulations. They represent, in fact, a considerable **risk for the user but also for the manufacturer**. More stringent regulations in consumer protection, product safety and liability legislation quickly lead to the question today as to **what blame in an accident can be attributed to the abrasive product manufacturer**. And then it is up to him to prove he has done everything possible to have safe products traded on the markets.

It is easier for oSa manufacturers to come up with this proof. They have expressly undertaken to apply the valid safety standards for abrasive products and the tougher engineering rules and standards in manufacturing and testing. **As part of their in-house quality management system**, they see to it that these **exacting provisions are kept to and that only safe, high quality abrasive products are produced and marketed**. The fact that the oSa issues the **worldwide protected oSa label** to members is confirmation of this internal commitment and certification.





Product liability

Unsafe abrasive products are dangerous. They represent a considerable health risk for the user and a risk of liability for manufacturers, traders and importers. If there is an accident, then the injured party could make them liable. The management of these companies can also be shown to be liable from the organizational point of view should the quality steps taken to govern production prove unsatisfactory.

oSa members have realized this and have protected themselves.

They do everything to minimize the potential for risk from their abrasive products. Their production is in line with the world's most stringent directives and the safety and quality of their abrasive products is monitored in conformity with the most up-to-date standards and provisions. oSa members also subject themselves to additional and even tougher regulations so as to manufacture safe products and avoid accidents in abrasive work.

Recognized quality safeguarding systems and osa membership ensure that the firms have taken effective measures to keep down the risks of liability claims.

There is to be no compromise on abrasive safety. It affects everybody. That is why the oSa claim reads **"Alliance for Safety and Quality"**. It can only function when everyone is involved.

oSa companies have taken on responsibility in contributing to more safety at the workplace. They now invite traders, importers and purchasing organizations to join this alliance for safety and quality.

oSa members do everything to reduce as far as possible the risk potential of their abrasive products. They manufacture to the world's most exacting directives and monitor their products' safety and quality in line with the most up-to-date standards and provisions.





Quality management with oSa certificate

Enhanced **market demands for safety and quality** ensure an ever-increasing complexity **in the making and testing of abrasive products**.

In the production of abrasives, the key priorities of **osa members** are always to **ensure the safety and effectiveness** of its products thus indirectly to satisfy customers demands.

Today evidence of product safety and quality must be on hand. The continual high quality of the various abrasive products demanded by users and traders alike requires controlled production, adherence to and implementation of quality assurance measures and thorough in-company documentation.

As an independent organization, the **oSa gives companies the right to use its globally protected oSa label** once they are in accordance with the European Safety Standards for abrasive products and to tougher production and testing provisions.

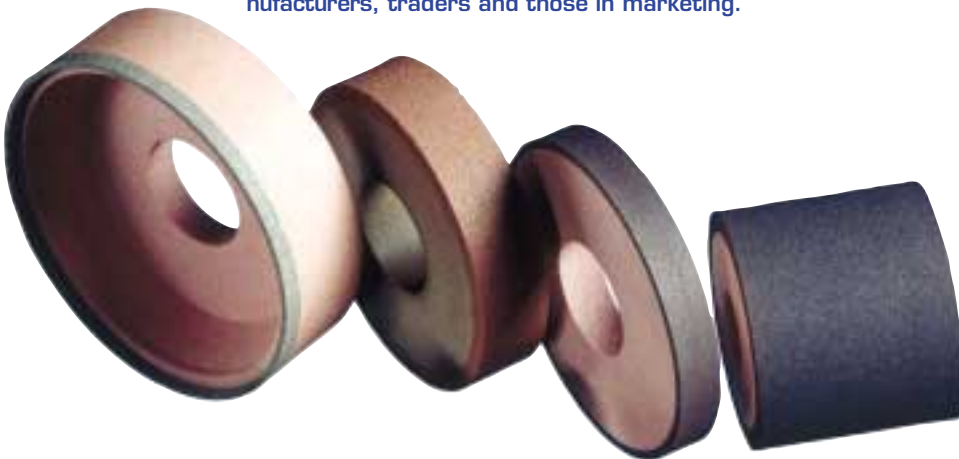
Moreover, there are testing provisions which all oSa members are to additionally use and which **make abrasive products even safer**. The oSa also works closely with national and international organizations and committees to bring engineering codes up to the state of the art and to rapidly take into consideration ongoing developments in abrasive safety.

Thus the **oSa label** on the abrasive product signifies **enhanced application safety for the user, a reduced liability risk and an excellent brand image for manufacturers, traders and those in marketing**.



The internal testing and certification is based on the following standards:

- *Safety standard for bonded abrasive products
(EN 12413: 1999)*
- *Safety standard for superabrasives – diamond and boron nitride
(EN 13236: 2001)*
- *Safety standard for coated abrasives
(EN 13743: 2002)*





Testing

All types of **abrasive products** are subject to particularly **high stresses** from centrifugal, cutting and tension forces. There is a considerable **risk of injury** should they not be sturdy enough and break. It should not be forgotten **that pieces breaking off from a cutting-off wheel rotating at a peripheral 80 m/s fly off at 290 km/h**. Thus in all professional and DIY fields of use it is vital that the safety requirements placed on abrasive products are strictly adhered to.

For many years **abrasive products** have been an **important driving force behind** the various **European standardization processes**. This is



shown by the fact that the

most important safety requirements on the production, condition and testing of abrasive products are to be

found in the **three basic CEN Safety Standards**. oSa asks its members to strictly comply with the standards

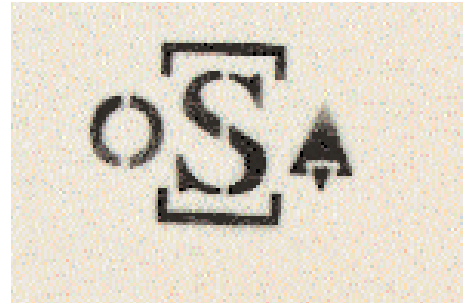
put in place.

Since standards, however, arise from a consensus of the pressure groups – resulting in the last resort in a compromise between different and often competing engineering approaches – **the oSa has taken it upon itself to develop and apply additional manufacturing and testing provisions to more clearly emphasize the safety aspect**.

The members themselves undertake to ensure that these provisions and instructions are adhered to and applied and, in doing so, independent and reputable testing institutes can be made use of.

Accepting a company into the oSa is accompanied by a **factory inspection** by an independent expert. This involves inspection of the manufacturing equipment, assessment of the testing techniques and an appraisal of the manufacturer's ability to meet the oSa's high safety requirements.

After this "quality audit" the independent expert drafts a test report. It details the outcome of the safety examination. **Should the applying company and its quality management system comply with the statutes**, then the oSa will document this by accepting the member and issuing the oSa membership certificate to the company.





The oSa organization

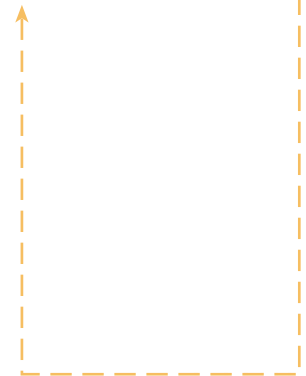
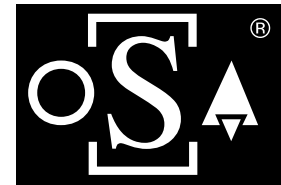
Companies which produce and market abrasive products from synthetic materials, such as corundum, silicon carbide, ceramic corundum, zircon corundum, diamond and cubic boron nitride (CBN) **can become members of the Organization for the Safety of Abrasives**. To become members and display the oSa label, the companies need to be willing and committed about adhering to oSa issuing regulations. Application for membership can be submitted in writing to the oSa secretarial office.

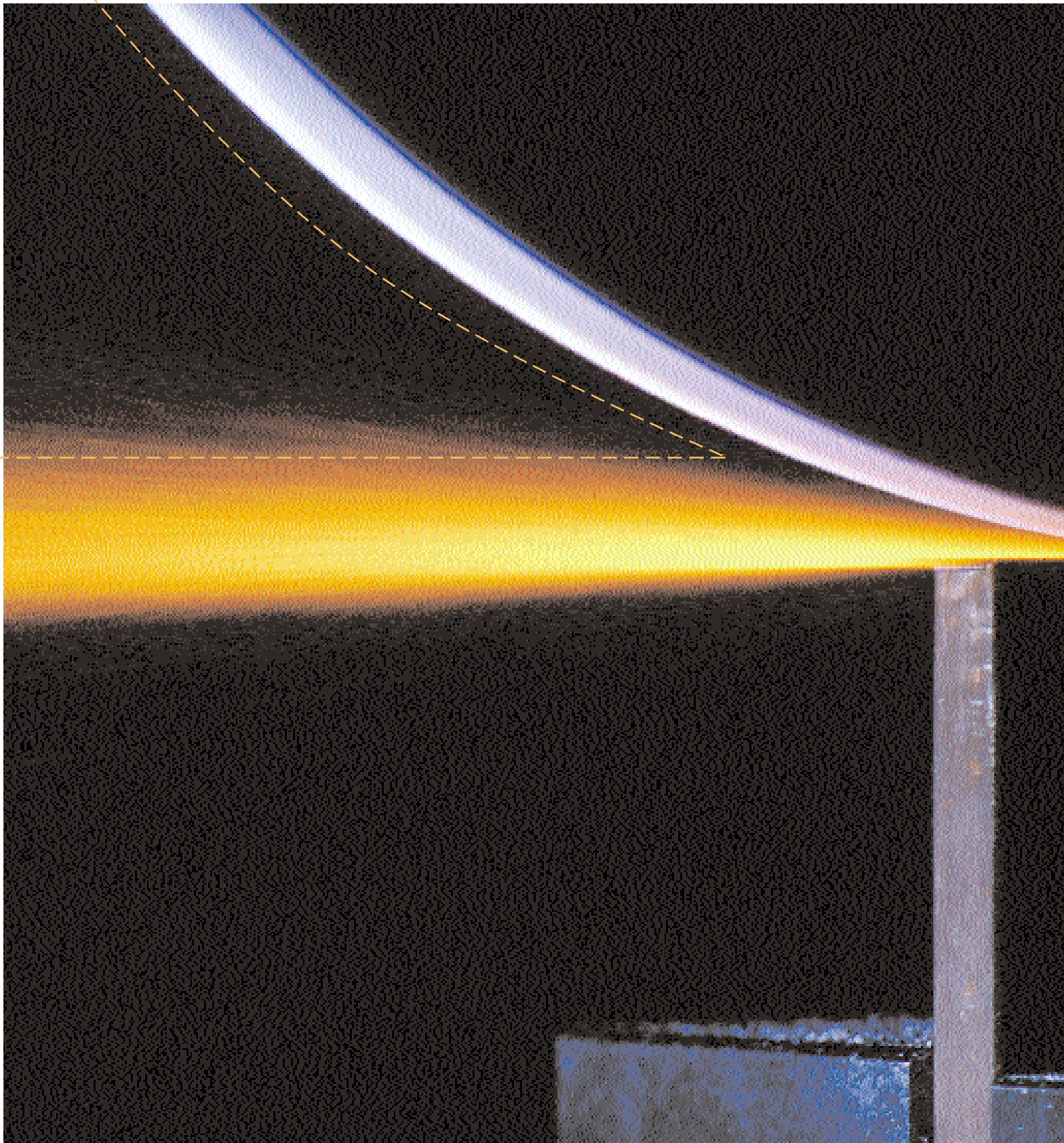
oSa membership is based on the manufacturer himself carrying out certification and testing of the abrasive products. In this way, the oSa clearly distinguishes itself from the former Deutscher Schleifscheibenausschuss DSA (German grinding wheel committee). It used to check and assess a design and, upon a test being passed, it issued a certificate. This was valid for some considerable time without re-examination. In contrast to the DSA each oSa member has itself to ensure that the European safety standards for abrasives (CEN standards) and other more exacting directives are strictly kept to.

Before a company is admitted, an independent expert carries out a works inspection on behalf of the oSa. He looks into whether the company applying has the requisite qualification and equipment to carry out the internal tests and keep to the exacting safety requirements. On fulfillment of the oSa's safety code and a positive assessment by the expert, the applying firm then becomes a member and has the right to use the oSa label. **There are clear regulations on marking and labelling of the registered products**.

A variety of sanctions up to exclusion from the organization can be imposed on members for contravening oSa's demanding safety regulations. Any unauthorized use of the label can be prosecuted and punished across the world.

For the user, oSa marked products are synonymous with an extremely high degree of safety in application. For the manufacturer they signify a reduced liability risk and a market and competitive benefit. An image gain is also involved since industry, politics and society are all becoming increasingly interested generally in safer products and user protection.







Membership Certificate

The Organization for the Safety of Abrasives (oSa)

herewith grants to the company

based on the received Application Form and Certificate of Obligation the right until withdrawn to use the oSa mark in the described colours for the abrasives notified.



This right applies to the designation of the registered tools as well as their packaging or labelling.

Bonn, _____ Executive Board _____

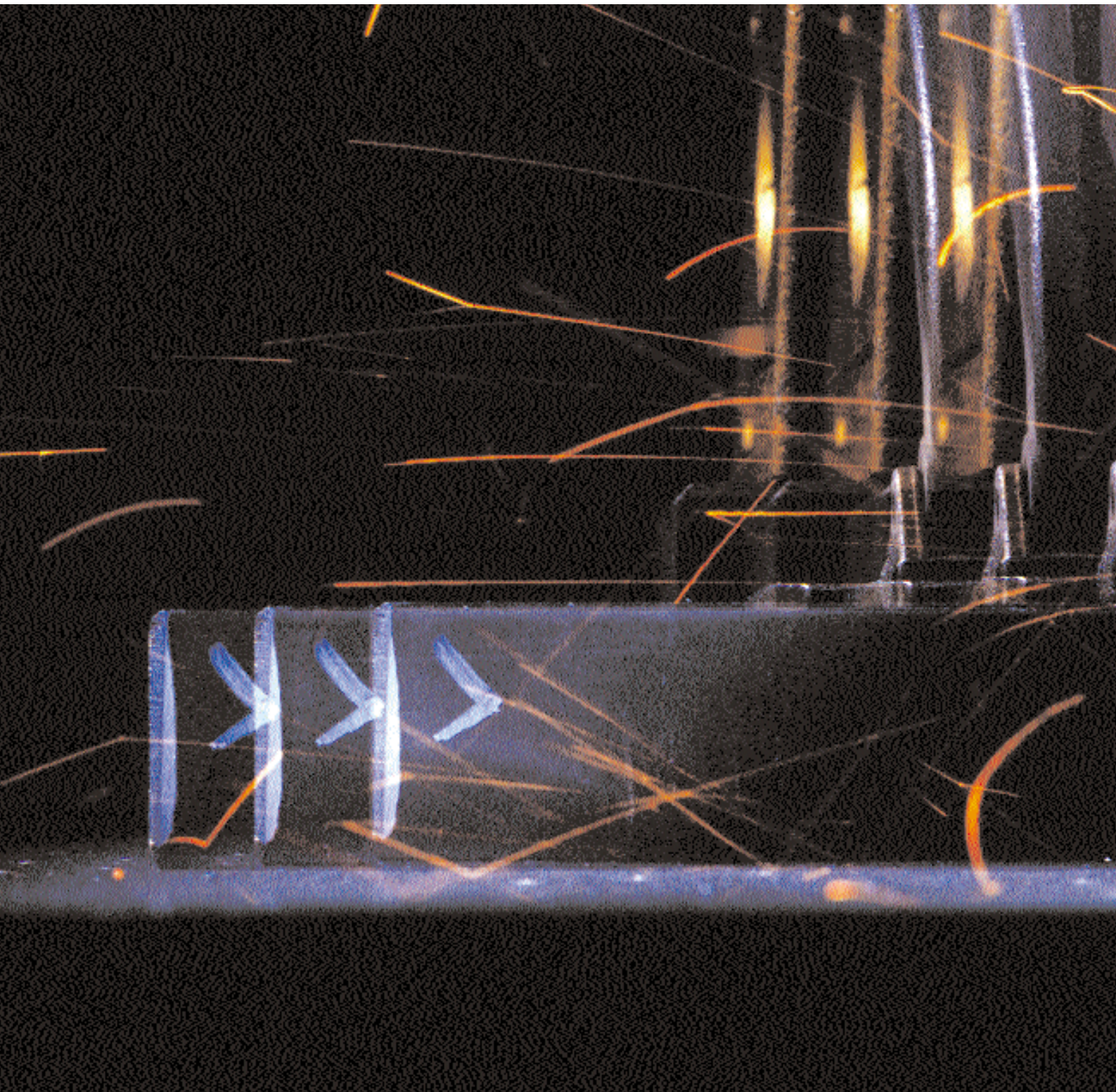


Imprint

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