

# PACO

## WORLD

Our International  
Wire&Mesh Magazine  
for Existing and  
Prospective Customers

Nr. 6 07/2003

## Long Live Globalisation!

Dear Reader!

There were times when only the "multis" were considered to be capable of serving a worldwide customer base. This has all changed now, as reflected by recent trends on the World's stock markets. Whereas interest in Blue Chips has noticeably diminished, investors in Mid Caps having been earning themselves a good return.

I can't come up with any new answers to explain the worldwide success of medium-sized companies. All I can say is that they have simply continued to develop their traditional strengths within a global environment: i.e. the flexibility of providing customer-specific solutions, an inherent ingenuity, the quest for providing quality and, last but not least, personal identification with customers and their respective needs.

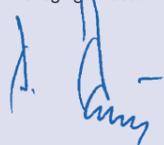
At PACO we see ourselves as a typical example of a family run Mid Cap that has gone global: exports account for 80% of our business. We have customers in most of the established industrial regions of the world – from Europe to North America and from the Middle East throughout Asia.

Our reorientation is, however, not just geographical; significant changes can also be seen in the range of goods and services that we offer. Over 50% of our current revenue is earned with products that are less than three years old.

Our new customers around the world have played their part in spurring us on to new developments. On the other hand, in the midst of global competition, they have found that we provide the best solution for their needs.

Finally a word for the hardened antiglobalists: whoever chooses to face up to global competition can lose out. Whoever doesn't has already lost. As far as we at PACO are concerned, we owe our success and each one of our jobs to globalisation.

Best regards  
Peter Ruppel  
Managing Director



It started with just  
a few looms ...

Today there are long lines  
of looms in the "long shop"  
at PACO in Steinau.



## 50 Years Paul & Co. GmbH: We're Celebrating the Future!

Big events are always eagerly anticipated: on September 20<sup>th</sup> 2003 PACO, or to be more exact: Paul & Co. GmbH, will be 50 years young. An ideal opportunity to not only reminisce but also, more importantly, to take a look into the future. That is why our anniversary has been given the motto: We're celebrating the future. And all of our customers, business partners and staff are warmly welcomed to do the same.

Once upon a time there was a "start up"  
We're in the year 1953. Two young men who had learned their trade at Ratazzi & May, which at the time was the oldest metal wire weaving mill around, decided to form their own company. They were joined by two silent partners who provided capital for the fledgling business. Everything started with three second-hand looms in a rented shed. The first product: screen printing cloth made of phosphorus bronze for printing textiles. But the market didn't give the company founders any time to sit

back and enjoy the small profit that they had made in their first full year of trading. Synthetic fabrics were already conquering textile printing – which meant that the young entrepreneurs had to act fast and strategically redirect their business activities. A feat that they were able to achieve extremely well!

Markets come and markets go – but the future is always there  
Textile printing was the first market that the young company was to lose. And it wasn't to be the last – right down to this day. Nevertheless, at the same time, PACO has continually gained new markets. Changes in customer needs, innovative technologies as well as newly learned capabilities have meant that, in an environment of constant change, PACO has become one of the World's leading suppliers of high precision metal wire cloths and metal filters. Listening carefully to find out exactly what the customer wants, pursuing markets trends and continually expanding internal capabilities have been the key to repeatedly creating a promising future for the company.

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**PACO Reference "Sand Control Systems":**

*Continued from page 1*

## We're Celebrating the Future!

**Principle of success: the customer's right to add value**  
Learning from history has always been a good idea. This is proved by the corporate history of PACO where, right from the very start, uncompromising customer orientation has always proved its worth. If the customer could benefit from PACO's performance and add value to their product, PACO would benefit as well. The last few years of the company's history have shown, however, that helping our customers to optimally increase the value of their products has become more demanding and increasingly complicated. It is not enough to simply sell a product – it has to be a complete solution. That is why Paul & Co. GmbH is a different company to the company founded 50 years ago. And that is why yet another completely different company will celebrate the next anniversary.



The logo that has been specially designed for the PACO anniversary combines the impressive number of years that the company has been in existence with the future orientation of the company.

## Stopping Sand Plugging the Pipeline

Oil production is a process that combines extreme mechanical robustness with filigree technology. A simple malfunction, such as sand plugging a filter element, can cause considerable complications and disproportionately high costs. In fact, the laying of a pipeline can be compared to launching a multiple stage rocket to the moon. If only one stage fails, it will never get there. To considerably improve sand control in the oil production industry, PACO produces plasma edge welded PACO KPZ weaves for system suppliers.

### Sand plugs filters

As small as a grain of sand might be, if you have enough of them – as is the case when producing oil – they can cause a lot of damage. This can be so severe that it can even cause the well-bore to collapse with the result that considerable expenditure is required to reactivate the oil well providing that reactivation is at all technically feasible.

It is, therefore, no surprise that specialist oil industry equipment suppliers around the world have been working hard to provide suitable sand control solutions. In close cooperation with PACO research and development, they have developed sand control screens that have been able to provide significant advances in sand control.

### Sand control and more

The "Expandable Sand Screen" (ESS) is the combination of an expandable base pipe with a range of metal weave filters sandwiched behind a protective shroud. The individual components have been pre-treated so that after being introduced into the sand formation, the ESS can be expanded by, for example, internally placed hydraulic tools. Frequently, the well-bore is to be produced off-shore, horizontally

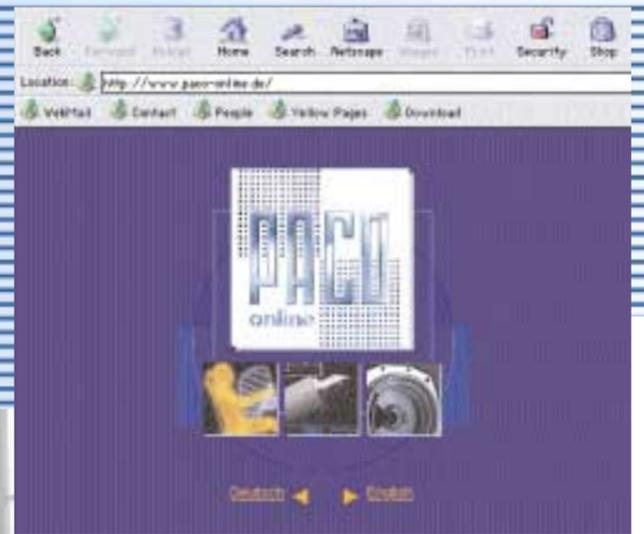
at a depth of 1000 m below sea level. At this depth, the continuous elements that consist of a number of individual segments are introduced horizontally into the sandstone formation up to a length of 2000 m with a minimum variation in height. Contrary to popular opinion, the oil is not waiting to be extracted in its pure form, but normally has to be filtered out of a formation that primarily consists of sand. For this purpose, the expandable sand filter provides specific advantages. It not only effectively prevents plugging with sand, but is also resistant to corrosion and wear. This not only increases the reliability of the hardware, but also the production capacity and lifetime of the well. Straight-forward adaptability to various bore diameters and conditions increases deployment flexibility and minimizes operating costs.

### PACO filter medium is first choice

When looking for a suitable partner for the required expandable filter medium, the well-known manufacturer of oil drilling equipment chose PACO. After extensive development work and tests, PACO precision cloth of the quality 316L as well as various nickel alloys proved to be optimally suited. The nominal mesh size ranges from 110 to 270  $\mu$ m with a minimum tolerance. PACO mechanically changes the cloths through a vacuum heat treating process, plasma welds the edges and delivers the filter media as half-finished goods. The ESS manufacturer then finishes the sandwich structure pipe elements in a variety of diameters and lengths as required. The oil industry has welcomed this new development as the new standard for sand control.

PACO filter media is worldwide the first choice for the supply of innovative sand control systems for the oil production industry.

**Further information**  
[www.Paco-online.com](http://www.Paco-online.com)



Visit us Online!  
[www.paco-online.com](http://www.paco-online.com)

## PACO History Part 1

# That's the Way it Was!

Interview with Wilhelm Ruppel

Wilhelm Ruppel is the co-founder and President of Paul & GmbH Co. While celebrating the company's 50<sup>th</sup> anniversary, he likes to reminisce about how things started as well as to take a look into the future. Albeit with mixed feelings, because of the current global economic climate. PACO World carried out the following interview with him.

**PACO World:** Mr. Ruppel, what are your feelings when you think about the 50<sup>th</sup> anniversary of your company?

**W. Ruppel:** I am, of course, very happy about this event. Although it is overshadowed by the difficult period that the world economy is going through. In the face of the economic

gave us the chance to prove our immense flexibility and extreme commitment. We changed our product range and established our quality strategy even though our capital cover back then was extremely thin.

**PACO World:** That was soon to change.

**W. Ruppel:** Yes, because we were used to economizing right from the start, one of our major priorities was to build up sufficient equity so that we didn't have to keep running to the bank every five minutes. We invested a lot, and always in the factory and production. Quality assurance was implemented by us 25 years ago. Our flexibility has meant that we have always been able to quickly react to new developments. Today there is virtually no branch of industry that can survive without metal cloth.

**PACO World:** Is there an event in the last 50 years that you particularly like to look back on?

**W. Ruppel:** Yes, as we established ourselves in the US American market. That was back in 1956. I had got in touch with an importer. He was of Jewish origin and had been displaced from my home country, Germany. Despite this, he gave me the chance to prove

what we could do by placing a trial order. Over the years, this business acquaintanceship has turned into a friendship, for which I am extremely grateful.

**PACO World:** And do you have any less positive memories?

**W. Ruppel:** Most certainly. We had developed a successful business relationship with a French business associate. That was back in the fifties. He went to the bank to transfer the money that he owed us. Unfortunately just before he got to the till he had a heart attack and dropped down

dead. We never did see the money – 280,000 Marks, which at that time was a considerable fortune. Our hearts stopped as well.

**PACO World:** What do you wish Paul & Co. GmbH for the future?

**W. Ruppel:** The up and coming generation mean a lot to me. I hope that they develop the ambition and pleasure in what they are doing to replace and build on the experience of every member of staff that enters into retirement. That will be good for their future and the future of Paul GmbH & Co.



**Wilhelm Ruppel,**  
 co-founder of Paul GmbH & Co.  
 He is particularly concerned  
 about the future of the younger  
 generation.

downturn, the poor Dollar exchange rate and cheap competition from Asia, our successful trading principle of "high quality with attractive conditions" is not as effective as it once was.

**PACO World:** But you surely have had to survive through difficult times in the past. At the very beginning, for example.

**W. Ruppel:** Yes, as almost all of our European competitors joined forces against us to make sure that we couldn't establish ourselves in the textile printing market. However, this

## PACOs Short Guide to Weaving

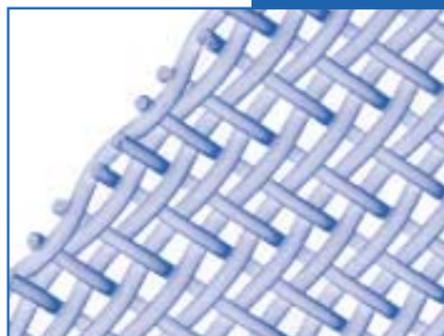
### 6. Herringbone twilled weave

There are a variety of different versions of twilled weaves. With herring-bone twilled weaves, the characteristic diagonal of the twill, such as can be recognized in cloths such as denim, is broken to produce a zigzag effect. This creates the V-shaped pattern that characterises the weave.

When producing metal wire cloths, for instance for filtering systems, the stability of the mesh is of particular importance. The herringbone twilled weave particularly provides advantages in this respect. The high precision production technology inherent to PACO looms ensures that there is almost no measurable change in the mesh even when the twill changes direction (zigzag). Generally the tolerance is well within that specified in ISO 9044, the currently applicable standard.

The herringbone twilled weave is preferred whenever belts require precise directional stability without prior mechanical correction (stretching, drawing out). This is necessary because mechanical correction can have a negative effect on the physical values of the cloth.

The attractive appearance of herringbone twills means that they are also used for decorative purposes, for instance in interior design.





## Steinau a.d. Straße: A Millennium Work: Grimms' Dictionary

Most people associate the Grimm Brothers with a collection of fairy tales. Besides this world famous collection of stories, Jacob and Wilhelm Grimm, who lived in Steinau a.d. Straße (where PACO is based) between 1791 and 1796, created a work that puts all other German language books in the shade: the 33 volume "Deutsche Wörterbuch" (German Dictionary).

The brothers Jacob and Wilhelm Grimm were anything but romantic collectors of fairy tales, in actual fact they were linguists and literary scholars. They established Germanic linguistics and the study of the German language and literature. Both were members of the Prussian Academy of Sciences in Berlin and both had a passion: the German language with all its roots and parallels to other languages and dialects. The following example out of Grimms' German Dictionary can be translated into today's English as fatless, lean, gaunt, meagre, skinny or any derivative thereof :

**MAGER**, adjective, without fat, without meat. old high german: magari; middle high german: mager; dutch: magher; english: meagre; old nordic: magr; swedish, danish: mager; that the in a noticeable way to the latin macer (that is continued in old french as magre, modern french as maigre, spanish, portugese, italian as magro) – linked adjective, is an old loanword from the latin that is widespread throughout a number of german dialects, is now assumed contrary to earlier opinion; without insight being able to given over the conditions, circumstances and course of this curious borrowing or even that a justified presumption hereto can be made."

Following this, there are a number of quotations and passages from writings and literature that document the usage of the word MAGER (meagre). The "German Dictionary" contains on 33812 pages the extensive linguistic explanation for each German word known in Grimms' days. Something that is anything but "meagre". The German literary guru Marcel Reich-Ranicki said: "In my opinion Grimms' Dictionary is the most interesting novel and the most important book in the German language." And, finally, to quote the lyricist Sarah Kirsch: "I don't surf the internet, I surf Grimm."



## PACO is in its element with filters

The chemical, pharmaceutical and food industry need a wide variety of the most demanding filtering processes. To satisfy these needs, PACO has specially conceived a range of individual components as well as complete filtering and precipitation systems. For example, monomer und polymer filters for the filtration of extremely viscous fluids, filter elements – cylindrical or pleated – for drying systems as well as filters and separating elements such as sieves, filter baskets and sintered metal elements etc.. The picture shows typical filter elements of the PACO FK-5065 range, of the type used to manufacture pharmaceuticals.

## PACO Quality Management Up-To-Date Certification!

After a year of intense work and preparation, the PACO quality management system was successfully certified according to ISO 9001:2000.

This latest QM certification standard extends quality control beyond the production process into nearly all processes within a company – from customer contacts through to human resources.

We are sure that the new certification will benefit our customers and ourselves within the context of the globalisation of markets, the Single European Market and ever increasing market pressure. A well thought through and implemented quality management process is far more use to a company than unused potential for optimisation and avoidable errors.



The 33 volume German Dictionary from the Brothers Grimm is available in paperback from the German publisher dtv for approx. 500 Euro. [www.dtv.de](http://www.dtv.de)

## Bits and Pieces

### About Economic Forecasting



- First principle of forecasting: Forecasting is very difficult, particularly when it involves future events.
- Also applicable: You know in the moment that you made the forecast: you are going to be wrong. You just don't know when and you don't know how.
- Another fundamental principle: When the facts don't correspond with the theory – so much the worse for the facts.
- When you make a forecast, specify either a figure or a point in time, but never both.
- If you don't know anything about the subject, then make your forecast on the basis of a carefully selected random sample of 300 other people who also don't know the answer.
- The all-rounders amongst the forecasters tend to find out less and less about more and more until in the end they know nothing about everything. On the other hand, forecasters that specialize find out more and more about less and less until in the end they know everything about nothing.

*More or less freely quoted from "How to Remain Meaningless but Nonetheless an Authority" by Edgar R. Fiedler.*

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