



# CHP Journal

August 2016 The Newsletter of 2G Energy AG

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## Foreword



Christian Grotholt

### Dear Readers,

We closed off the 2015 financial year at this year's Annual General Meeting at the beginning of July and would like to take this opportunity to reiterate our thanks to our shareholders for their support and for their appreciation of the performance of the 2G Energy AG team. The extremely positive figures for the first half of 2016 justify their confidence and once again highlight our company's consistent performance.

However, although the current results are important, I think our success can be attributed much more to the strategic decisions we have taken over last few years, making ourselves increasingly independent of the conditions prevailing in individual markets. Not only our wide range of products between 20 and 4000 kW but also our increasingly tight network give us global access and an increasing presence in different markets. In this context, we recently managed to incorporate strategically important partners PENN Power in the USA and Sino German Green Energy Technology Co. Ltd in China.

With our "2G partner concept", we are currently building the foundations for direct and individual market access by 2G partners anywhere in the world. Right through from the online portal [my.2-g.com](http://my.2-g.com), via the design and expansion of training concepts to the involvement of partners in service planning, our partner concept is ensuring systematic integration of partner companies within 2G's process landscape. 2G's digitization process outlined in the CHP Journal before last is playing a decisive role in this.

Alongside expanding its business with and through partners, the prerequisite for successful business is having a functional Quality Management system and so we have dedicated the lead article in this issue of CHP Journal to this topic. In the interview, Production Manager Gert Wetter and Quality Management Manager Tobias Henke explain how product quality and process quality are ensured and continuously improved in our day-to-day operations. I hope you enjoy reading this edition.

A handwritten signature in blue ink that reads 'Christian Grotholt'.

Christian Grotholt  
CEO 2G Energy AG

## A 5 MW project for British Sugar

### British Sugar uses sugar beet pulp to generate heat and electricity

British Sugar is a leading processor of sugar in Great Britain and produces around 1 million tons of sugar in the UK, and 500,000 tons of animal feed products from sugar beet pulp.

Combined Heat and Power (CHP) technology is a significant part of their daily business, with existing CHP operations at each of their 4 operational beet processing sites in the UK. The CHP at Wissington factory also supplies hot water and excess carbon dioxide to greenhouses at Cornerways Farm to help grow over 140 million tomatoes each year.



As a containerized plug and play solution, the impressive 5 MW plant was installed and commissioned within only 30 days.

British Sugar has recently invested in an AD plant at their Bury St. Edmunds, using sugar beet pressed pulp to feed the digesters and generate biogas, to fire two 2G CHP gas engines; helping to provide 8,000 households with electricity.

The two CHP gas engine plants are installed in separate containers. One of the containers contains six sections. Those sections contain the engine with an avus biogas plant, the gas pressure system, the water system with the heat recovery system, the plate heat exchanger and the pumps. At the far end there is a further container with the control system and the oil storage tanks in it. Both CHP gas engine plants are equipped with high voltage switchgear, and are directly connected to the national electricity grid. On top of the container is another container with an air ventilation system, combined with the air filtering system in it.

The installed CHP gas engine plants are an avus 3000a with an electrical and thermal output of 2.8 MW, and an avus 2000b with an electrical and thermal output of 2.2 MW. The total efficiency of both plants is approximately 86 %, which is significantly higher than commercial fossil fuel power plants.

The gas engines were designed, manufactured and tested in Germany. After being disassembled, the separate container sections were transported on trucks to the UK, where they were installed and commissioned within 30 days.

## Fresh every day: home-produced energy

### Kamps Bakery uses energy-efficient 2G technology

Kamps has been a dynamic and innovative company since it was established in 1982 and has now become one of the leading craft bakeries in Germany.

The first Kamps bakery shop was opened in Friedrichstraße in Düsseldorf in 1982. Today there are around 400 Kamps shops offering fresh, hand-crafted baked goods. In addition, there are around 70 Kamps bakeries throughout the whole of Germany and two in the Middle East.

E.ON Energy Solutions GmbH stepped in as contractor for customized distributed supply solutions. It developed the concept in consultation with Kamps and planned and erected the entire plant. Together they commissioned a 2G Energy AG agenitor 406 with buffer tank at Kamps GmbH in Schwalmthal. The installed 2G power plant operates with natural gas and ensures a sustainable and, above all, economical electricity and heat supply to the production plant and administration building.

CEO Thomas Prangemeier was thrilled when he visited the CHP plant: "For many years now, Kamps has attached great importance to the environmentally-friendly and economical use of resources. Following the introduction of our certified Energy Management System, we could see that this was just the start. With the commissioning of our CHP plant, we have reached another milestone on the way to reducing CO<sub>2</sub> emissions. Generating electricity and heat

as needed enables us to save 490 tones of CO<sub>2</sub> every year. As well as commissioning our CHP plant, we are also, of course, continuing our efforts to make our production and sales operations ever more environmentally compatible."



From left to right: CEO Thomas Prangemeier and Sven Hennemann, Energy and Production Technology Manager at Kamps Bakery.

The agenitor 406 generates an electrical output of 250 kW and a thermal output of 260 kW. The overall efficiency of the plant is 85.3 %, representing an important contribution to energy efficiency, both in ecological and economical terms. The agenitor 406 is helping the Schwalmthal site to reduce energy costs and conserve the environment. The 2G power plant was installed in a high-line container painted in neutral white. This type of installation is characterized by low noise emissions (45 dB (A)) and a short installation time (plug and play).

### "From the supplier to the end customer – everyone is involved in the quality process."

CHP plants are being installed throughout the world to conserve resources and especially to reduce the operator's energy costs for years to come. It is therefore all the more important for the plant to meet the highest quality requirements in continuous operation. In an interview, Production Manager Gert Wetter and QM Manager Tobias Henke explain how 2G meets these requirements.

The term "Quality" is probably used by virtually every manufacturer of capital goods when presenting their external image. Why is Quality particularly important in the area of CHP, and especially for 2G, of course?

*Tobias Henke:* Just like other capital goods, a CHP plant will be operated for years to come and is therefore an integral part of the production process or business model – depending upon its application. If the quality of the plant is lacking, this will inevitably lead to dissatisfaction on the part of the customer and will inevitably cost them money. However, the main purpose of our product and the justification for investing in a CHP plant is to reduce costs. Reliability is therefore right at the top of our agenda. But this can only be achieved by maintaining the highest quality standards.

*Gert Wetter:* You have to remember that a CHP plant is not just used now and again but often operates 24 hours a day and must always be available. Depending upon the design of the plant, many different mechanical and thermal requirements are placed upon the 2G power plant – it is therefore self-evident that overall quality must be there.

So, the main yardstick for quality at 2G is ensuring that the customer's expectations of the product are met?



Gert Wetter, Production Manager

*Tobias:* Precisely. We regard our customers' opinion to be one of the most important factors. Apart from the conventional methods such as a new customer survey and numerous discussions in all areas of our day-to-day business, we have two people in the field who visit our customers outside regular maintenance times to check the condition of the plant, talk to the customer, collect feedback and even provide technical support, if necessary.

**Gert, you mentioned "Quality as a whole", but a 2G power plant is made up of many different components and separate**

**parts. How can you ensure quality from your suppliers?**

*Gert:* For many years now, we have enjoyed an excellent relationship with all our major suppliers and we develop our products together with them or adapt them for certain market requirements or special customer requirements. Our development departments, in particular, are very closely linked in some areas, so that we can pass on our quality requirements to external companies. But, even for components that require less development or for standard parts, our requirements are very strict and potential suppliers are always carefully vetted.

*Tobias:* All in all, we could say that it's an integrative process; from the supplier to the end customer – everyone is involved in the quality process, so that a reliable 2G power plant is installed for the customer at the end of the supply chain.

**So product quality goes hand in hand with process quality?**

*Tobias:* Indeed – and in a company of our size they cannot function separately. What use is it if the product itself has been developed to meet the highest standards of quality but there is no continuity at the interfaces between work steps in the production process or with the customer on site? As Gert has just said, Quality can only be considered as a whole.

**And that is down to 2G's employees. How exactly are they involved in the Quality process?**

*Gert:* From receipt of the components to commissioning on the customer's site, the plants undergo a total of five major quality checks, in which every department and every employee plays a part: starting from incoming inspection of the goods, via stage checks during switchgear construction, factory commissioning, outgoing goods inspection right through to final commissioning at the customer's site. Of course, this all takes place within the framework of defined and documented procedures to guarantee traceability at all times.

**Is it not difficult to maintain an overview, especially because, given the complexity of a CHP plant, so many data have to be gathered for each work step?**



Tobias Henke, QM Manager

*Tobias:* The potential offered by digitization is an enormous help with this. The complete life-cycle of the 2G power plant is digitally recorded and documented right from the very start. Another key strategy is to standardize components and use the same parts for different series. Compared with our huge portfolio of CHP plants with capacities of between 20 and 4000 kW, we



Stefan Liesner (right) talking to Gert Wetter and Tobias Henke.

have a comparatively small and therefore easy-to-manage stock list. Moreover, we have incorporated our associated partners into our digital systems, so that we can network in all directions.

**You refer to the complete life-cycle of the plant. But surely the quality process does not end when the plant is sent out to the customer?**

*Tobias:* Certainly not. Obviously, plant maintenance is also subject to high quality requirements for the individual work steps and maintenance stages over the entire service life of the plant. Nothing is left to chance and maintenance intervals and spare parts schedules are planned in advance in great detail.

**What impact has globalization had on 2G's quality processes?**

*Gert:* As far as production is concerned, globalization essentially means that our product range has to be more varied. There are countless different requirements, from the requirements of the electricity grids in different countries through to safety technology. In this respect, well-structured production planning is vitally important.

*Tobias:* This is where our experience from projects in more than 40 countries really pays off. We have learned from our previous mistakes and do not repeat them. This continues to be a great help to us – especially in view of our partner concept, which has now been rolled out worldwide.

**Gert, you have been at 2G since 2006. Are you impressed by the progress that has been made in this area?**

*Gert:* It is always exciting to look back at the progress that has been made over

the last ten years. When I first started, we operated with all-rounders in every area of the company – nowadays each individual employee is much more highly specialized. Because the company is growing in size, each employee is now a small cog in a big wheel. Nevertheless, one must never lose sight of the big picture. Quality and process conformity should never inhibit creativity or motivation – employees at all levels agree on this.

**And how many employees are specifically involved in the Quality Management process?**

*Tobias:* Essentially all of them. Of course we have our own department dedicated exclusively to QM. However, we see ourselves more in the role of coordinators to animate the process and to raise awareness

*Tobias:* We regard the standard as a guide for our processes and employees. As Gert has already mentioned, we do not want to artificially inhibit 2G's creativity and innovative potential, so as to create an administrative vacuum. Ultimately, it is merely a case of using the standard and the associated variables as a tool to incorporate customer requirements into our operating processes as best we can, so that they become an integral part of these processes. In doing this, we can apply DIN EN ISO 9001 in a process-directed way to encourage interlocking of operating processes and we can also redefine our understanding of Quality throughout the company as a whole.

*Many thanks for this discussion.*

**"Quality and process conformity should never inhibit creativity and motivation."**

about Quality and the need to comply with the process instructions. This applies to all areas of the company. Besides, we are constantly amazed to see how employees build on existing instructions and are always refining them of their own accord.

**And a final question: What part does 2G Energy AG's DIN EN ISO 9001 certification play?**

## Setting a good example

### Moving towards DIN EN ISO 14001 and DIN EN ISO 50001 certification

In addition to its DIN EN ISO 9001 certification, 2G Energy AG plans to go a step further, probably this year. 2G Energietechnik GmbH is currently in the process of obtaining certification under Environmental Management standard DIN EN ISO 14001. All 2G companies and sites in Germany are preparing themselves for certification under Energy Management standard 50001. This standard requires that energy

be used efficiently in all areas of a company. "Because we are pioneers in the field of energy technology and energy efficiency, it is only logical to have this certification" explains Stefan Liesner, 2G Marketing Manager. The following tables summarize the main standards and certificates that 2G Energy AG and its subsidiaries abide by in their day-to-day business.

### International Management Standards

Designation	Description	Certified
<b>DIN EN ISO 9001</b>	Quality Management system	12/2013 2G Energy AG, 2G Energietechnik GmbH, 2G Drives GmbH; 2G Energy Ltd. (05/2015)
<b>OHSAS 18001</b>	Occupational Health and Safety Assessment Series	07/2016 2G Energietechnik GmbH
<b>DIN EN ISO 14001</b>	Environmental Management System	11/2016 (in preparation) 2G Energietechnik GmbH
<b>DIN EN ISO 50001</b>	Energy Management System	12/2016 (in preparation) 2G Energy AG, 2G Energietechnik GmbH, 2G Drives GmbH, 2G Rental GmbH, 2G Home GmbH

### Supplier certificates

Designation	Description	Certified
<b>Achilles</b>	UK utilities industry (supplier portal) Qualification for the UK energy supply industry (supplier portal) in terms of quality, occupational health and safety and environmental protection	03/2015 2G Energietechnik GmbH

## Product standards

Designation	Description	Certified
<b>BDEW-Richtlinie</b> (German Association of Energy and Water Industries) Guideline including FGW TR3, FGW TR4, FGW TR8	Unit certificates in compliance with the Medium Voltage Guideline  Technical Guideline for Power Generation Plants on the Medium Voltage Grid	10/2014
<b>UL 508A NRTL</b> Nationally Recognized Testing Laboratories	Industrial Control Panels (comparable with IEC 60204-1)  Authorization for the sale of products in the USA and Canada (regulation for switchgear cabinets to meet specific safety requirements)	04/2014
<b>DIN EN 61439</b>	Standard-compliant switching and control systems  Definition of requirements for all low voltage electrical switching and control systems to protect people and equipment	2016
<b>VDR AR-N4105</b>	Power Generation Plants on the Low Voltage Grid  Minimum technical requirements for connection and parallel operation of power generation plants on the low voltage grid	2011
<b>DIN EN 60335-1</b>	Safety of electrical equipment for domestic use and similar purposes (product-related g-box 20)	2015
<b>DIN EN 50465</b>	Gas appliances  Combined heat and power appliance of nominal heat input equal to or less than 70 kW (product-related g-box 20)	2015
<b>DIN EN 61000-XX</b>	Electromagnetic compatibility (product-related g-box 20)	2015
<b>UL 2200</b>	Standard for Stationary Engine Generator Assemblies (US)	2017 (in preparation)

## 2G ends 2015 with solid results

Successful Annual General Meeting with 200 shareholders and guests



Christian Grotholt, CEO of 2G Energy AG, reflects on a successful financial year.

Around 200 shareholders and guests accepted 2G Energy AG's invitation to attend this year's Annual General meeting in Ahaus on 5 July 2016.

As outlined by Chief Executive Officer Christian Grotholt and Chief Financial Officer Dietmar Brockhaus, 2G had made good progress in the transitional year of 2015 – between the amendment of the Renewable Energy Sources Act 2014 and the CHP Act on 1 January 2016 – and had achieved its set targets, with a turnover of 152.9 million Euros and an EBIT margin of 3.1 %. Good growth was achieved by overseas business and the Service business sector in particular.

The latter now accounts for one third of Group turnover. In his speech, Christian Grotholt thanked all 2G employees for their conscientious and successful cooperation, without which the successes of the 2015 financial year would not have been possible. However, he also referred to political events. For 2G, the fact that the EU Commission has still not approved the CHP Act 2016 means that, in 2016, incoming orders from Germany for natural gas-fired 2G power plants are 7 million Euros below the level of the previous year (19 million Euros). Orders from abroad have increased and now make up 44 % of the CHP-related turnover. Thus 2G is once more demonstrating that, as

a medium-sized company, it can quickly and flexibly adapt to prevailing market conditions. The Board also took a relaxed view of the government bill for amendment of the Renewable Energy Sources Act 2016 (EEG 2-16), which was passed by the Federal cabinet on 8 June 2016.

The bill includes a few (market-oriented) changes in the payment and subsidy structures for biomass plants (and so also for CHP plants). State payments for electricity generated by biomass plants will in future be determined by tendering. The tender quantities (for new and existing biomass plants) should be 150 MW for 2017 to 2019 and 200 MW for 2020 to 2022 respectively. Existing biomass plants can also participate in the tendering process to obtain 10-year follow-up financing. This means that a follow-up provision will be included in the Renewable Energy Sources Act for the very first time.

The planned continued development of more flexible operation of biogas plants pursuant to EEG 2014 is also important for 2G's potential sales.

In view of the healthy order book in the middle of the year, most of which can presumably still be settled in 2016, and the turnover already achieved, as well as ongoing Service business, the Board confirmed a sales and profit forecast of 150 – 170 million Euros and EBIT margin of 3 – 5 % for the 2016 financial year. The Board expects to reach the higher figure in each case.

### **Founding of an independent subsidiary in France**

In keeping with the growth achieved over the last two years, 2G now has a strong foothold in the marketplace with an approx. 30% share in the French market for biogas-fired CHP plants. To consolidate this position and to benefit from the forecast upturn in sales opportunities in future, 2G is to establish an independent French sales and service company based in Nantes. 2G has already appointed the CEO, who is an expert in this sector and has successfully worked in France in technical sales and project management functions for international companies. 2G Solutions of Cogeneration S.L., Vic (Barcelona), which was founded in 2008, will in future concentrate on sales and service on the Iberian Peninsula and in the Maghreb countries. It is gradually handing over its activities and networks within the French market.

### **CFO Dietmar Brockhaus' contract extended**

The Supervisory Board has extended the contract of CFO Dietmar Brockhaus by 5 years. Brockhaus is therefore appointed as a member of 2G Energy AG's Board until the end of 2021 and will continue to be responsible for Finance, Law, HR and Investor Relations.

## 2G steps up its business with China

### 2G station set up in Beijing

For more than three decades now, China's economy has been growing at a breathtaking rate. Its GNP has increased 35-fold and is now second in the world behind the USA – but ahead of Japan and Germany. As we sadly have to acknowledge, this rapid growth has been at the expense of the environment. Today the Chinese population is confronted by environmental pollution in nearly every aspect of their lives. One of the main causes of air pollution in China is the use of coal-fired power stations to generate energy. The Chinese government has now acknowledged this situation and is promoting cleaner and more environmentally compatible energy generation.

And this is one of the main reasons why 2G sees enormous market potential in China. For many years now, 2G has been active in the Chinese marketplace and has completed several projects in China with various Chinese partners. In order to increase this business, 2G opened its own 2G station in China on 1 June 2016. The 2G Station China is being run by Mrs. Feng, who is a qualified graduate engineer and has 25 years experience in the Chinese electricity industry. Staffed by Mrs. Feng and two other experts, the 2G Station China will exclusively sell 2G products on a completely independent basis. In addition to this, the Beijing site will also organize the Service requirements for 2G plants in the surrounding area.

## Penn Power becomes new distributor in the USA

### Sales and service partner

In PENN Power Group, 2G has found another major partner to help it penetrate the US market. PENN Power, which works the market with its subsidiaries Northeast Energy Systems in the North-East and Western Energy Systems in the West, is an ideal addition to the sales structure of 2G Energy Inc., based in St. Augustine, Florida.

With decades of experience in the field of distributed energy supply, PENN Power not only sells plants but also produces feasibility studies, offers project management and system integration and carries out maintenance work.



Paul Glenister, CEO of 2G Energy Inc., is delighted by the prospect of working together: "The partnership between 2G and PENN Power will help to expand the sales and service network in key areas of the USA."

## New in France: 2G Energie SAS

### France expert Jürgen Klein to be CEO

It is now ten years since the first 2G power plant was commissioned in France. It was a cogeneration plant on a anaerobic digestion plant. Since then, 2G has installed several dozen plants in France, even including cogeneration plants fired by natural gas. With a 30 % share in the market for biogas-operated CHP plants, 2G has already carved out a good market position for itself. Continuous further growth is expected in France over the next few years, as it is in other West European countries.

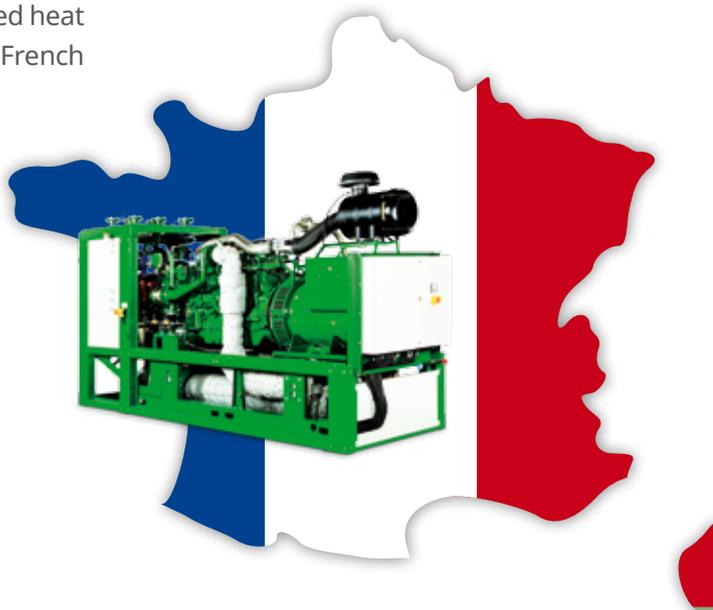
Since 1 April, Jürgen Klein has been helping the 2G Group to consolidate its position in his capacity as CEO of the newly founded French subsidiary, 2G Energie SAS.

As a mechanical engineer with many years of experience in the field of distributed energy supply, he will be representing the 2G group in the French market. Klein has lived in France for 10 years and so, in addition to his expertise in the field of combined heat and power, he also understands the French mentality and speaks the language.



Jürgen Klein is the new CEO of 2G Energie SAS headquartered in Nantes.

"Together with my team, I am looking forward to further developing the French natural gas and biogas market and increasing 2G's market share," says Klein.



## Benvenuto to 2G

The Italian website [www.2-g.it](http://www.2-g.it) is now live



In July last year the German and English versions of the 2G website were adapted to the new 2G corporate design and a lot of useful information was added. Our Italian subsidiary followed suit in July this year with [www.2-g.it](http://www.2-g.it).

"The new website consolidates our presence in the Italian marketplace and enables our Italian customers to buy more easily and in their own language," says CEO of 2G Italia Srl, Christian Manca. "Hopefully our new web presence will demonstrate the growth and, of course, the potential of the 2G group and boost interaction with our customers."

## 2G now has its own YouTube channel

**Corporate film, references, interviews etc. in various languages**

It is now possible to find out all about 2G in the form of moving images. Corporate videos, interviews, project descriptions and much more are presented on the new YouTube channel in various languages.

Marketing Manager Stefan Liesner is enthusiastic about the use of YouTube as an additional publicity medium: "Especially for our global partner concept, it is important that we are able to present our products and our company in a way that is both comprehensive and always up-to-date. In this respect there is no difference between industrial goods and consumer goods."

**Take a look: [www.youtube.com](http://www.youtube.com)**

**Search word: 2G Energy AG**



## "Service 2020" project: Even quicker and more efficient day-to-day operations

### Expansion of the Service network, BestInClass factory service and digitization

In view of increasing national and international demands for reliability, speed and efficiency, 2G has been concentrating for several months now on optimizing its Service processes (see detailed report in CHP Journal of April 2016). The "Service 2020" project is particularly focusing on the following areas:

- Extending the close-mesh Service network
- Establishing a BestInClass factory service
- Digitization and significant expansion of web applications

2G Service already occupies a strong position in the domestic market, and also in international markets. The tried and tested strategy of involving partners will be further expanded and intensified as part of the "Service 2020" project, enabling day-to-day operations to be delivered even more quickly.

The BestInClass factory service should also help to enhance Service performance. In this way, partners will be supported by 2G experts on more complex tasks.

And, last but not least, the newly created online platform [my.2-g.com](http://my.2-g.com) will allow partners to digitally manage the plants they look after. This means that partners can not

only monitor plant parameters digitally and in real-time but they can also plan Service assignments, access technical documents or place online orders for accessories and spare parts.



Digitization offers great advantages for communications between 2G employees and 2G partner companies. For example, all work carried out in a plant can be documented in real-time so that it is immediately available to everyone involved in the process. All with the goal of providing prompt and professional support to plant operators at all times.

## Open day in Jühnde bioenergy village

A village leads the way in terms of flexibility, independence and efficiency



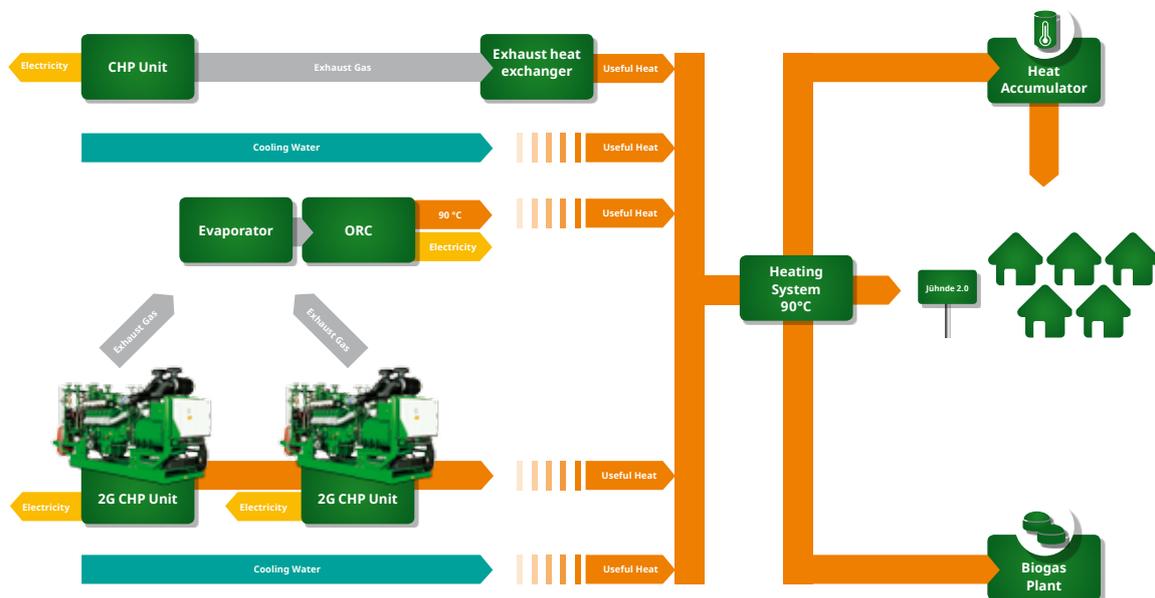
Keen interest in 2G's engine technology

Jühnde is the first bioenergy village of its kind in Germany. Using biomass and two 2G avus 500 plus plants (550 kW electrical and 526 kW thermal capacity), amongst other things, the village generates twice as much electricity as it needs – additionally the adjacent houses are very efficiently supplied with heat.

At the annual Open Day on 18 June, visitors once again had the opportunity to look behind the scenes at the energy village. 2G also presented itself and the two avus 500 plus plants, which, with a total electrical capacity of 1,100 kW, are regarded as the heart of the whole system. The day was

very successful for all concerned and will be repeated again next year.

The graphic on the next page shows how the two 2G power plants are incorporated into Jühnde's supply concept. The electricity produced by the avus 500 plus plants is fed into the grid. Thermal energy is fed into the heating system. The special feature of this concept is the utilization of the hot exhaust gases from the plants. These are taken to an evaporator and used in a so-called ORC (Organic Rankine Cycle) process to produce electricity. This in turn makes for even greater electrical efficiency.



Jühnde's supply concept. The special feature: waste heat produced by electricity generation is used in an ORC process to produce more electricity.

## Visit us at the trade fair!

### Upcoming trade fair dates

01/09 – 04/09/2016	Norla	Rendsburg	Germany
13/09 – 15/09/2016	Space 2016	Rennes	France
13/09 – 15/09/2016	RWM	Birmingham	Great Britain
15/09/2016	19. Energietag Rheinland-Pfalz	Bingen	Germany
17/09 – 25/09/2016	Bayrisches ZLF 2016	Munich	Germany
19/10/2016	McTER Cogenerazione	Verona	Italy
08/11 – 11/11/2016	Key Energy	Rimini	Italy
15/11 – 18/11/2016	Energy Decentral Hanover	Hanover	Germany
05/12 – 07/12/2016	GreenLive Kalkar	Kalkar	Germany
18/01 – 19/01/2017	Biogas Infotage – renergie Allgäu e. V.	Ulm	Germany
07/02 – 09/02/2017	E-world energy & water	Essen	Germany
08/02 – 09/02/2017	Biogas – expo & congress	Offenburg	Germany

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