

UNVEILING DIGITAL DISRUPTION

Unveiling Digital Disruption

CODE_n16

PUBLISHED BY
GFT Innovations GmbH, Schelmenwasenstr. 34
70567 Stuttgart, Germany | www.code-n.org

CODE_n ■

GLOBAL PARTNERS


High performance. Delivered.


UNDER THE PATRONAGE OF
PROF. DR. JOHANNA WANKA
Federal Ministry
of Education
and Research

GFT ■


Hewlett Packard
Enterprise

TRUMPF


6 **FOREWORD** by Ulrich Dietz

8 **About CODE _n**

STARTUPS

APPLIED FINTECH

13 BIOWATCH
14 Bit2Me | Hive
15 Blockchain Helix
16 BuchhaltungsButler
17 Community Life
18 creditshelf
19 CRiskCo
20 Everledger
21 fino
22 Ginmon
23 Kantox
24 TaxFree4U
25 Valsight

CONNECTED MOBILITY

27 Augmensys
28 blickshift
29 dynacrowd | Wasabi
30 evopark
31 Geospin
32 Insider Navigation
33 Kinemic
34 KREATIZE
35 Netbeast
36 R3Coms
37 sensisys
38 Toposens
39 Ubermetrics Technologies

HEALTHTECH

41 AmbiGate
42 AMPARO
43 Blue Bird Technologies
44 diafyt
45 egoHEALTH
46 HealMet
47 Hindsait
48 nevisQ
49 NonInvasive Medical Devices (NIMD)
50 NovioSense BV
51 Quantum Base
52 SpinDiag
53 WearHealth

PHOTONICS 4.0

55 8tree
56 Bodle Technologies
57 Enigma Biotech
58 FaunaPhotonics
59 ioxp
60 LightFab
61 LuxFlux
62 otego
63 Roboception
64 twip optical solutions
65 UrbanAlps | Stealth Key
66 Wearable Life Science |
ANTELOPE.CLUB
67 XARION Laser Acoustics

JURY

70 Frank Riemensperger
70 Dr. Frank Schlie-Roosen
71 Carsten Knop
71 Ulrich Dietz
72 Volkhard Bregulla
72 Martina Merz
73 Dr. Peter Leibinger
73 Prof. Dr. Peter Weibel

PARTNERS

GLOBAL PARTNERS

76 Accenture
76 Federeal Ministry
of Education and Research
77 GFT Technologies SE
77 Hewlett Packard Enterprise
78 TRUMPF

INNOVATION PARTNERS

78 B. Braun
79 EnBW
79 Vector Informatik

HOSTS

80

SUPPORTERS

81

EVENT PARTNERS

81

COMMUNITY PARTNERS

81

MEDIA PARTNERS

81

SPONSORS

82 **IMPRINT**

FOREWORD

The world is entirely changing. Our lives are hyper-connected to each other by multiple personal networks. Information is available at the touch of a button. We personally expect nothing less day-to-day, so why should we expect anything less as a customer? To win the tug-of-war, companies have to recognize world-changing ideas and continually reinvent themselves. The vision and passion of young entrepreneurs, dovetailed with the experience of established businesses, create a win-win situation for both parties. And this doesn't just apply to the Apples and Facebooks of this world. Digital developments are moving ahead at full speed, revolutionizing entire sectors of the industry. Business leaders need to change their mindset and consider digital transformation as a business strategy.

As Socrates already said: "The secret of change is to focus all your energy not into fighting the old but building the new." CODE_n is picking up on that impulse, while enabling companies to take part in today's technological trends. We believe that change and innovation need reliable networks and cooperation. The new.New Festival is taking this idea to the next level. We created a hotspot for digital pioneers and innovative thought leaders. In the heart of Baden-Württemberg, a region which boasts one of Europe's strongest and most innovative economies, the ZKM – Center for Art and Media – in Karlsruhe will host our festival with its unique combination of business, tech, science, and art.



The fifth year of the CODE_n CONTEST has seen about 380 startups from 40 countries toss their hats into the ring, all offering solutions related to this year's contest clusters Applied FinTech, Connected Mobility, HealthTech and Photonics 4.0. We were not only excited about the resounding interest we captured, but we were also excited about the extraordinary level of quality of the applications we received. The 52 finalists will provide us with a sneak peek of the future, competing for our widely acclaimed CODE_n Award according to the motto "Unveiling Digital Disruption."

11,000 square meters of space within five – fifteen-meter high – atriums will serve as the proving ground for many outstanding solutions and forward looking, innovative companies

from various industries. Come in and discover the spectacular setting for so much pioneering spirit and creativity. Together with our top-notch partners, we are putting together a one-of-a-kind conference agenda on six stages that will make our festival an extraordinary experience for everyone.

Digitalization is no longer a distant or futuristic fantasy. Drop by the new.New Festival to become part of an extraordinary event. The world of tomorrow is already taking shape today – let's shape it together.

Yours truly,
Ulrich Dietz

ABOUT CODE_n

About CODE_n

Initiated by the IT company GFT Technologies in 2011, CODE_n is a global innovation ecosystem for young entrepreneurs and leading companies. Featuring elements such as CONTEST, CULTURE, CONNECT and SPACES, CODE_n offers a platform which networks companies, investors and innovative personalities, simultaneously supporting the development of new digital business models. CODE_n stands for “Code of the New,” the DNA of innovation. Primary aim is to drive digital progress through new thinking and daring ideas.

CODE_n CONTEST – the worldwide startup competition The CODE_n startup contest is a key pillar, composed in this year’s four trendy clusters – Applied FinTech, Connected Mobility, HealthTech, and Photonics 4.0. Now taking place for the fifth time, CODE_n will bestow the annual CODE_n AWARD – this year under the motto “Unveiling Digital Disruption”. The competition saw more than 385 applicants from 40 countries with the finalists narrowed down to the most innovative 52 startups from 11 countries who will present their innovative business models at the new.New Festival. They throw their hat in the ring to win the renowned CODE_n Award as well as the grand prize of €30,000.

CODE_n EVENTS – with its flagship new.New Festival At spectacular events CODE_n brings together digital pioneers and innovation managers from all over the world. After four success-

ful years at the world’s leading IT fair CeBIT, CODE_n launches its own digital innovation festival in Karlsruhe, Germany, on September 20-22. Initiating this event, CODE_n takes it to the next level. In the heart of Baden-Württemberg, a region which boasts one of Europe’s strongest and most innovative economies, the ZKM – Center for Art and Media – will host the new CODE_n event with its unique combination of business, tech, science, and art. The museum has become a cultural institution for digital media throughout the world. The 11,000 square meter exhibition area will provide plenty of space to present the pioneering innovations of startups and corporates in order to show what’s already possible today.

CODE_n SPACES – the innovation campus Forward-looking ideas finally become reality. At GFT’s headquarter in Stuttgart, CODE_n offers selected pioneers, innovation teams from established companies and experienced managers a unique and professional working milieu within a creative environment and co-working spaces.

CODE_n CONNECT – the digital network As part of the CODE_n ecosystem, the exclusive digital network CODE_n CONNECT brings together young and established companies to work together on future topics. Startups from all around the world are invited to register for matchmaking through CODE_n CONNECT. A match-making feature provides individual networking impulses.

STARTUPS



The Applied Fintech category is about financial solutions based on new thinking and new technologies, brought together in a very smart way. It's about the "real world" – not just an idea but a clearly defined and dedicated business case. This new approach either solves known challenges in a highly innovative way or lays a path to completely uncharted territories.

The financial sector interfaces with all parts of life – it's basically the foundation for everything. We interact with any number of things and are engaged in uncountable activities every day, sometimes consciously, sometimes not. As this happens, a myriad of data points are collected and stored within financial systems.

Where are those assets? How can we enrich them and make them more extensive? Who will analyze them, and how, or to what end? What role do humans play now and what could their role be in the future? How can we automate the financial tasks that are carried out by humans today – and at the same time create instant output that's of a much better quality?

APPLIED FINTECH



BIOWATCH

Biowatch is a disruptive startup in the field of biometric authentication. Our product is a wearable device that stores all of your required credentials for logins, access to a building, to unlock a car, or to use a mobile device to make payments. This device communicates via BLE and NFC with a wide range of devices in the ever-growing digital ecosystem, but here comes the magic: Only the legitimate user can wear and use an active module, since authentication is achieved by means of a miniaturized, wrist-vein recognition component embedded in the wearable.

What's even better, you can still wear your favorite Swiss watch in addition to the Biowatch. This is the Swiss answer to security, connectivity, and fashion. Biowatch's business is wearable biometrics. Its mission is to provide alternative solutions to current authentication methods, such as PINs, passwords, cards, and keys. Biowatch's Swiss-made, patented technology integrates nicely into wristbands, smart watches and even luxury watchstraps.



Bit2Me | Hive

Imagine for a moment that it might be possible to take care of your banking from anywhere in the world, all without middleman companies and at no extra cost. This is Hive. Hive is a fintech mobile application that provides the finance market with a disruptive way to decentralize inances, thereby building a social-banking ecosystem that never touches the users' money. It allows users to self-organize in order to create a global, peer-to-peer human network infrastructure for conducting banking around the world –

in real time and with no additional costs (e.g., remittances, payments, donations, lending). Banking without banks. No middlemen. The user in the center. Conduct your banking business with local individuals rather than with banks. Hive is a smartphone wallet app that never holds the user's money. Hive helps users self-organize to build a network infrastructure for adding and withdrawing local currencies without banks or financial institutions. It connects people, it connects money.



Blockchain Helix

Blockchain Helix (BCH) provides a universal system architecture based on blockchain technology. We provide secure identity management for identification and a legally secure Web x.O. BCH also establishes trust relationships between unknown traders. Data leaks resulting from inadequately protected third-party servers lead to loss of confidence. The release of user data must be better protected: only when absolutely necessary and only when authorized by the user. BCH provides an authentication network

in which users authenticate via a central trust center (TRUST). This allows you to assign a unique digital identity to each user. Fraud in transactions can be effectively prevented. Digital business transactions in BCH are programmable. For example, the know-your-customer (KYC) process between onboard customers and an insurer can be optimized. In addition, even people without bank accounts and IoT devices can be integrated. BCH is also working on the development of a digital rights system.





BuchhaltungsButler

BuchhaltungsButler is a collaboration platform for tax advisors and SMEs and has as its focus automation technology. What differentiates us from our competitors are our outstanding invoice-recognition capabilities, our matching technology, and an automatic account-assignment procedure. Our software implements AI and learns at a user and at a cross-user level for maximum accuracy and individualization. The software is intuitively designed and easy to use. It requires very little accounting knowledge, but it still meets the requirements of professional accountants.

We developed our SaaS platform for the needs of SMEs and tried to rethink accounting from a different perspective. Our goal is to transform accounting from an unwelcome and unwanted duty to an automated process that people love. Encouraged by the volume of positive feedback from our users and cooperating tax advisors, we are looking forward to continued growth and development over the next few years as we become a well-established player in this competitive market.



BUCHHALTUNGS
BUTLER



Community Life

Founders Dr. Claudia Lang and Stefan Keck were experienced managers in insurance, Lang being a board member. They observed long-term changes in customer behavior to which insurers did not adjust. The reasons are manifold: traditional distribution organizations that consider digital distribution as competition, incompatible IT infrastructure, and the misunderstanding of and commitment to the necessary changes on all management levels. There was a need for an insurance company that was managed like an IT

enterprise. Therefore, Lang and Keck developed a business model in which customer-facing aspects (such as customer service and communication) are separated from the technical insurance aspects (such as financials and regulatory reporting) and managed by different companies. This gives the customer-facing partner the flexibility needed for a contemporary service model, a part of this being the customer's advocate in product development, thus reaching much further than a traditional broker.





creditsheff

creditsheff is Germany's first online marketplace for B2B loans. The combination of finance and state-of-the-art technology creates advantages for borrowers as well as investors. With loan sizes of €100k to €2.5m, creditsheff attracts small and mid-sized companies generating more than €2.5m annual revenues. Typical investors are funds, family businesses, and

other investors committing minimum funds of €10k. Bringing these parties together and enabling them to interact directly with each other is not only creditsheff's lofty vision, but it is also the driver of our success. creditsheff is growing strongly and we're confident that we'll be expanding into the rest of Europe in the near future.



CREDITSHSELF



CRiskCo

CRiskCo is disrupting the credit information business, a business ruled by dinosaurs like D&B and Experian that lacks the tools and data needed to predict or manage credit portfolios. We help businesses reduce bad debt and make good credit decisions by providing credit-risk information, predicting future defaults, and assessing risks of current and potential customers. Our platform changes the way business credit information is handled: not as a one-time report based on partial, often outdated data,

but as a continuous stream of real-time information, with ongoing monitoring and alerts, helping form stronger relationships between credit provider and client, and reducing credit failures. CRiskCo's revolutionary approach includes the use of unique artificial intelligence algorithms, big-data models, and cloud-based technology. With strong partnerships and over \$185m of volume running through our system, we are heading to be the standard for SME risk assessment in the US.





Everledger

Everledger is a permanent, global, digital ledger that tracks and protects diamonds and other valuable items throughout their commercial lifetime. Using blockchain technology, Everledger provides traders, insurance companies, financiers, consumers and law enforcement personnel with an unchangeable history of an item's authenticity, existence and ownership. Everledger is a leader in the real-world application of blockchain technology. Once items are registered in the blockchain, the records are permanent

and cannot be modified and so provide a clear audit trail which may be used by multiple parties throughout the supply chain in order to prove authenticity and reduce the risk of fraud, theft and trafficking. Since April 2015, Everledger has developed relationships with major partners in the global diamond industry and have digitally certified over 980,000 diamonds. Everledger's technology can be extended to any item of value including fine art and luxury goods.



fino

Last year fino pioneered an intelligent account switch in 8 minutes. We are expanding this pioneering role continuously by providing our partners new features for better customer onboarding each month. Today this entails a full bank switch, which includes a bank account, credit card and deposit switch as well as our digital self-assessment and contract safe. The digital self-assessment allows for a comprehensive review of the customer in just three steps: sales analysis, expenditure account analysis

and the valuation of sales. The contract safe is filled automatically, helping plan the customer's finances and thereby optimizing them and this helps to attract and retain customers. Furthermore, it's the bank manager's starting point for further consultations and other services. Founder Florian Christ is supported by a dynamic team which instills confidence through its extensive expertise and technical know-how in different areas.



founders
Lars Reiner
Ulrich Bauer
Raphael Vosen



year of launch
2015

address
Voltastr. 31
60486 Frankfurt, Germany

company
Ginmon GmbH
www.ginmon.de

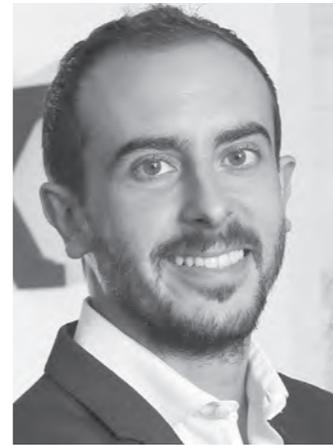
Ginmon

Ginmon provides a full-service web solution for efficient personal wealth management. Based on the results of a short interview, we offer a portfolio of well-diversified (more than 10,000 companies in 50 countries) and cost-efficient ETFs tailored to your individual needs. Our investment strategy is based on proven and Nobel Prize-winning scientific concepts, including constant rebalancing and countercyclical investment, thereby optimizing your risk-return trade-off. We continually evaluate the asset classes of the managed portfolios to

ensure that our customers profit from top-notch investment products. With our cutting-edge web platform, you keep full control over your investments and have access to ongoing and easy-to-understand reporting and monitoring. On top of that, we provide comprehensive investment information and very personal service. Due to our state-of-the-art technology and the full automation of our portfolio management, we can offer our products at the lowest costs possible.



founders
Philippe Gellis
Toni Rami
John Carbajal



year of launch
2011

address
6 Bevis Marks
London EC3A7BA, UK

company
Kantox Limited
www.kantox.com

Kantox

Kantox is a multinational fintech company offering FX management solutions. We develop technology to solve one of the major pain-points faced by international companies: currency management. We believe that the financial industry, known for its opacity and lack of innovation, needs a radical change. It's time to redefine the industry, adopting more transparent, efficient, and fairer models. In the end, it's all about the value we bring to

clients. Our expertise, products, and solutions allow our customers to manage their currency exposure, to build hedging strategies, to automate FX transactions, and to process international payments in a smart way. We are experts in currency and risk management, offering technology and expertise to companies in order to solve their currency-related business problems transparently and efficiently.





TaxFree4U

TaxFree4U is an online VAT-refund service created for shopping in the EU. TaxFree4U is dedicated to making retail transactions between merchants and their foreign customers more beneficial. Our process of VAT return is simpler than any currently existing ones in the market, thereby giving clients more time to enjoy their shopping. We provide innovative services for non-EU residents with the quickest return and smallest service fees. Our clients receive up to 19% of their purchase price returned to them. Our company

has created a unique online platform that allows clients to get VAT refunds in five easy steps: Step 1: Register in TaxFree4U system – Step 2: Upload your receipts to the website or via our mobile application – Step 3: Get your complete VAT refund form – Step 4: Stamp your VAT form and send it to our processing center – Step 5: Receive your refund on your TaxFree card within 48 hours. For our customers' convenience, we offer a TaxFree4U Card in order to receive refunds within 48 hours and at the lowest fees.



Valsight

Valsight offers interactive simulations of business scenarios based on value driver models, combining business planning and forecasting with predictive analytics. Our goal is to empower finance function to use analytics methods by making them intuitively available to management accountants.

Valsight lets you:

- Instantly create financial models or adapt scenarios to changed business conditions
- Dynamically manage central assumptions and analyze their impact on top KPIs

- Perform driver-based simulations for scenarios using probabilities

Since 2015, Valsight has already implemented its solution successfully in medium-sized to large enterprises (DAX 30). The founding team has a strong background in enterprise software and IT consulting, as well as extensive startup experience. All members graduated from the renowned Hasso Plattner Institute (HPI) in Potsdam, Germany, where Valsight started as a spin-off in 2015.



The digitalization of our world and the intelligence moving in “everything” opens completely new possibilities – improving the way we live, we work, we consume and communicate. The world starts arranging around us, knowing our needs, taking away tasks, easing our lives and enabling us to manage even greater complexity than we ever could have managed before.

Connected Mobility specifies the mobile aspect of this new world – and the impact on the new transportation solutions for people, goods and information required to deliver the new value propositions and all the surrounding systems involved to make these happen.

Connected Mobility is about connected cars and the new services building around it – it is about integrated services supporting us to travel smarter, finding the optimal transportation solution, ensuring a relaxed and efficient journey, offering us individual services depending on where we are, which situation we are in and what are our preferences.

But it is also about the automation and optimization of the supply chain often spanning across companies and continents, about the fast delivery of goods or commodities as well as the tractability of goods, based on their origin, where they are and the condition they are in.

Finding the most efficient and secure logistical solution for a logistical task to do, ensuring legal and compliance rules while delivering a new and surprising experience for the user of the service is at the core of connected mobility.

What is the “next” thing startups are accelerating with? We are looking for new exciting concepts supporting, enabling and innovating connected mobility. Amongst others these can be around personal transportation, analytics, swarm intelligence, the connected car, security and compliance, interconnectivity, autonomous driving, manufacturing logistics, supply chain optimization, goods transportation, location based services, logistical marketplaces and track & trace solutions.

CONNECTED MOBILITY



Augmensys

UBIK® is the leading mobile data-management software with augmented reality (AR) support, and which is made solely for use in enterprise scenarios. Why does UBIK® exist? The initiators pursued an ambitious idea when they founded the company: the injection of augmented reality into industrial processes to overcome significant usability obstacles (such as the complexity of expert systems) that prevent today’s users from benefiting from the value of existing data. The 25-member Augmensys team is working in four different countries to make this industry soft-

ware solution into an indispensable tool for every company. Every user is able to use all available data onsite, regardless of background and knowledge of where the data may be coming from or going to. Many years of experience in this area have enabled Augmensys to identify and use a company’s data optimization potential. Against this background, they have succeeded in establishing a young, ambitious, and innovative team which gives everything to make their dream come true.



blickshift

We are entering a new era of intelligent human-computer-interaction systems, in which human reaction and planning information is gaining in importance. Blickshift provides products and services for the deep analysis of eye movements and other forms of human-machine interaction. At present, our primary target markets are the automotive industry and the market-research sector. Our main product is "Blickshift Analytics," a revolutionary new data-analytics software using cutting-edge results from visual

analytics research. We also offer consulting services for eye-tracking analysis and we develop customized data analysis solutions. Blickshift was founded in 2016 by three doctoral graduates from the Institute for Visualization and Interactive Systems at the University of Stuttgart. Our vision is to develop highly innovative software for revolutionary future technologies, such as personalized driver-assistance systems, automatic driving, human-machine interaction, and big-data analytics.

// **blickshift**



dynacrowd | Wasabi

Wasabi is a local messenger ecosystem that changes the way people can explore, connect, and interact in their vicinity. It's an all-in-one platform for connecting mobile users with people, information, services, and devices while traveling. Wasabi's unique mobile micro-page concept allows for any kind of interaction. Built-in microflows (e.g., information, chats, voting, or e-commerce) can be easily supple-

mented by third-party processes. Wasabi is built on Dynacrowd's YOU OS technology, which offers a set of business services to manage and maintain any community. A YOU OS SDK product line enables the building of individual location-based mobile solutions. The main focus is on SaaS solutions (e.g., tourism and travel) and on building apps for highly focused, content-driven communities.

YOU OS[®]
a dynacrowd brand

founders
 Manik Hermann
 Sven Lackinger
 Maximilian Messing
 Tobias Weiper

year of launch
 2014



address
 Sedanstr. 31-33
 50668 Köln, Germany

company
 evopark GmbH
 www.evopark.de

evopark

The Cologne-based startup evopark is Germany's leading provider of digital off-street parking solutions. The evopark app allows you to easily find off-street parking locations and to check their real-time availability. Parking garage tickets become obsolete as you can enter and exit parking garages by automatically opening gates by means of RFID technology (the "evotag"). At exclusive retail and restaurant partners, you receive a significant discount on your parking

fees. And you are conveniently invoiced only once a month. Following a successful pilot program run in 2015, evopark is now available in 16 German cities and will increase its network to more than 25 cities by the end of this year. In addition to international parking garage operators like Q-Park, evopark also works in close collaboration with large retail chains (e.g., Douglas) and provides its solution to clients such as Porsche, Audi, and AXA.

evopark
 evolution in parking

founders
 Johannes Bendler
 Tobias Brandt
 Christoph Gebele
 Niklas Goby
 Sebastian Wagner

year of launch
 2016



address
 c/o Universität Freiburg
 Platz der Alten Synagoge
 79098 Freiburg i. Br., Germany

company
 Geospin GmbH
 www.geospin.de

Geospin

How do you profit from your own data? We help you offer your services at the right time and in the right place. We support you from start to finish. From data editing and cleaning to data analysis and prediction, we are your reliable partner for finding specific answers to the challenges facing your company. Big Data Analytics: Asking the right questions is the first step. Statistical modeling, machine learning, neural networks, and deep learning are methods we apply to get the most out of your digital resources. We employ state-of-the-art big-data methods to help you gain

the most from your data treasures. Geographic **Insights:** Our special focus is geospatial analysis. Based on several years of cutting-edge research, we have developed methods that we can tailor to your company's challenges. The results aren't just maps – they are visualizations that finally explain all aspects of your data. Predictive Analytics: All of these detailed results do not just reflect the status quo. We calculate temporal and spatial predictions based on your specifications. In this way, we provide you with the soundest basis for your strategic decisions.

GEOSPIN
 spatial intelligence



Insider Navigation

Insider Navigation (INS) is the first company to offer augmented, reality-based, intuitive, millimeter-accurate indoor navigation without the use of additional hardware (patent pending). Since the project's beginning, we have been working closely with research partners from various institutes and universities. Fifteen years of experience in researching augmented reality make them the ideal research and technology partners. INS is a subsidiary of innovation.rocks, a digital transformation agency that has been

pioneering innovative mobile and augmented-reality solutions worldwide. We provide visitors with a mobile app, which supports them like a personal indoor assistant. Tenants are able to boost their revenues due to new possibilities for marketing campaigns and services. Satisfied customers lead to better brand recognition and increased operator revenue. Thanks to our innovative team, we are your perfect partner for entering a new level of augmented, indoor navigation experiences.



Kinemic

Kinemic enables hands-free, mobile, gesture-based interaction, all without the need to pick up a keyboard or device. Kinemic develops software to control and interact with digital devices – from smartwatch to smartphone to augmented-reality glasses and PCs – by simply using hand and arm motions. Our platform and device-independent software recognizes these movements and translates them into gestures or AirWriting; that is,

text written in the air. Kinemic's technology can be easily integrated into applications or mobile apps and our first customers are already using it successfully. Through the combination of text entry and gesture recognition, complex user interfaces can be developed. Device interaction is drastically simplified and tasks can be completed more quickly and with fewer interruptions.





KREATIZE

KREATIZE is an online B2B platform for ordering custom parts and prototypes quickly and easily. Intelligent software supports the customer in finding the manufacturing process and materials that best fit their individual project needs. Then, the optimal supplier is selected from KREATIZE's global manufacturing network. Say goodbye to cumbersome and tedious searches for suppliers, and to selection processes characterized by complexity, uncertainty, and inefficiency. The Smart Project Realizer developed by KREATIZE

lets customers turn their visions into reality in just four easy steps: uploading a 3D CAD model, matching it to the right manufacturing process and materials, selecting a supplier, and shipping the completed custom part. The aim of KREATIZE's Smart Project Realizer is to optimize the inefficient process of custom part and prototype procurement for small and medium-sized enterprises, and to reduce the transaction costs for customers and suppliers alike.

KREATIZE ✓



Netbeast

Netbeast's mission is to ensure homes help the people who live in them to focus on what really matters. We develop, market, and support software tools that make it possible to connect IoT devices. We strive to become the de-facto connectivity platform for the Internet of Things. Today's smart home devices do not interact with each other, since they use too many different communication standards. Due to this complexity, most cannot ultimately communicate. This results

in a fragmented market. There are many smart home devices and brands, but there is no unified smart home experience. If you buy some of these products, rather than improving your quality of life, you may end up wasting a lot of time trying to make them work! Netbeast is an app that allows you to control all your smart home devices from a single interface. Thanks to its open source technology, it can connect any and all devices regardless of their type or technology.


NETBEAST



R3Coms

R3Coms develops and commercializes an ultra-reliable, real-time-enabled wireless communication infrastructure – currently focusing on industrial applications where robustness, safety, and security are primary concerns. Our technology is primarily intended for the field of IoT, where wireless communication must be deterministic, robust, and offer low latency and safety features. This will be increasingly important as communications between embedded systems (M2M) becomes more and more common. Our products

reduce the costs imposed by today's cable-based communications. As the demand for connectivity and mobility continues to grow, cables will cease to be an economical and feasible option, since they are inflexible, require complex planning and execution, and increase final costs. Our technology comes in the form of scalable software implemented on standard off-the-shelf radio chips, and is available in two performance categories depending on the requirements of the higher-layer application.



sensivys

sensivys develops vibration and acoustic sensor solutions for a wide variety of potential applications. Currently, our main focus is early train detection and monitoring for railways, using solid-state rail vibrations instead of the large amounts of expensive cabling needed by current solutions. This dramatically reduces the material, installation, and maintenance costs and is more eco-friendly. We also develop solutions for other fields of application and are open to developing proposed vibration-sensor solutions to meet your

business needs. Since 2015, we have cooperated with Deutsche Bahn, our partner and main customer in Germany, as a result of participating in the first Deutsche Bahn Accelerator program. sensivys offers significantly lower costs and increased functionality compared to your current solutions, opening the door to new ideas formerly precluded by costs and technology. We will help you find, develop, and implement the most appropriate solution for your business to ensure your competitive advantage and thus long-term success.

sensivys
 sensing vision systems

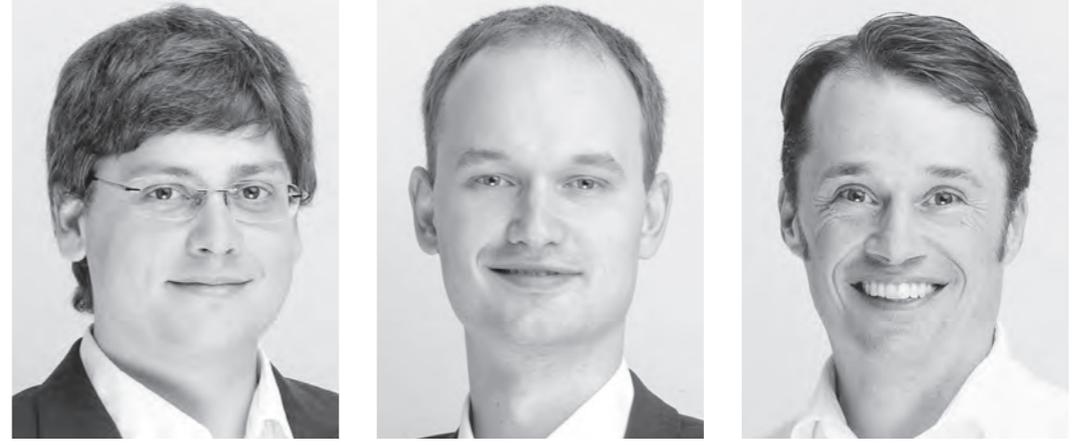


Toposens

Toposens builds innovative 3D sensor technology that can perceive its surroundings via ultrasound in real time. We use off-the-shelf, low-cost components and arrange them in a specific design. By combining this hardware with our unique software expertise, we are able to detect the 3D positions of objects and people using a small but powerful sensor. Our sensor is the first of its kind – until now, no other company has been able to make real-time 3D ultrasound scans with one single sensor system. Toposens gives machines



and robots a bat's ability to see in the dark. The sensor can be used for gesture control (e.g., for TVs), collision avoidance (e.g., for autonomous logistics robots), and to track people (e.g., for customer analytics in retail stores). For the first time, ultrasound technology specifications make it possible to build a 3D sensor system which is small, lightweight, energy-efficient and precise. Our sensor technology also protects privacy and is reasonably priced.



Ubermetrics Technologies

Founded in 2011, Ubermetrics refines and filters public information from online and offline sources to help companies optimize business decisions and performance. We've spent the past years developing technology to harness the power of massive amounts of public data and information, so our users can quickly react to the needs of their customers, new opportunities, and fast-changing market dynamics. Our scalable technology plat-

form handles multiple languages and processes data from more than 400 million sources in real time. That's why companies like BMW, Deloitte, DHL, Microsoft, Randstad, Danone, and Roland Berger rely on Ubermetrics to inform their most critical decisions for use cases in the areas of marketing, PR, sales, strategy, and supply chain management.



Like traditional industry, the combined health and health care sectors represent one of the largest markets affected by the digital transformation. Factors with the biggest impact on markets include the price squeeze, the increasing need to come up with product innovations, and registration. This is made worse by a lack of resources (especially in terms of HR), dealing with regulatory compliance, and management. Established institutions must change the way they operate dramatically – including their way of doing business – for their own sake and for the sake of patients.

While global players struggle to keep pace, young companies are growing and responding to the ongoing ‘consumerization’ of this sector. New technologies have to be implemented to cut costs yet still improve quality. These will also help make processes more efficient and transparent, enabling organizations to react to privatization and globalization, and develop virtual value chains.

Sophisticated, available, and affordable products, services, and technologies are the way forward. It is these kinds of solutions that will set the pace.

HEALTHTECH



founders
Caroline Dabels
Christian Frede
Stephan Dabels

year of launch
2015

address
Ob dem Himmelreich 7
72074 Tübingen, Germany

company
AmbiGate GmbH
www.ambigate.com

AmbiGate

eReha is a video game-based exercise therapy for domestic and business environment, developed by AmbiGate. It can be used preventively, parallel to physiotherapy and for corporate healthcare programs. The system provides medical exercises in a virtual environment, called ExerGames. A 3D sensor analyses the patient's exercises and locates false movements in real time. During the workout, innovative disease-specific parameters can be generated and sent to the physiotherapist for a dynamic therapy progress. Advantages

include home-trainingdata for Physios of their patients, lower costs for health insurance providers dealing with back pain issues, 24/7 training for patients at home, and companies can provide a solution for a healthier workplace without inconveniences. Starting with back pain the system later will be used for all kind of kinesiatics. AmbiGate received the “Start-up ICT innovative Award” and a grant sponsored by the German Federal Ministry of Economics Affairs and Energy.



founders
Lucas Paes de Melo
Wesley Teerlink
Felix Dietrich

year of launch
2016

address
Universität Potsdam
Potsdam Transfer
Projekt: Amparo
August-Bebel-Str. 89, Haus 7
14482 Potsdam, Germany

company
Amparo GmbH
www.amparo.com.de



AMPARO

The health care infrastructure in developing nations is insufficient. Eighty percent of the world's amputees lack access to prosthetic devices. Since the state-of-the-art technology to craft the socket of a below-the-knee prosthesis requires a specialized workshop and a lot of training, the Amparo socket presents a much simpler and faster solution. It is made from a thermoplastic material which allows the socket

to be molded directly onto the patient's limb and to be remolded as many times as necessary. The Amparo socket and fitting method allows a technician to make a full prosthesis in less than two hours. The highly committed and multi-disciplinary Amparo team works with one of the best prosthetics workshops in Berlin and, at the same time, it is supported by a large and growing network of users and practitioners worldwide.

AMPARO

founders
Frank C. Eckert
Benjamin Vähle

year of launch
2015

address
Kurfürstenstr. 114
10787 Berlin, Germany

company
Blue Bird Technologies UG (haftungsbeschränkt)
www.blue-bird-tech.com



Blue Bird Technologies

Blue Bird Technologies' mobile therapy assistant helps people with mental disorders regain control of their emotions and prevent everyday psychological crises and self-harm. It uses smartphone sensor data and machine learning to predict emotional crises and suggests optimal

interventions at the best points in time. Patients are thereby empowered to avoid and mitigate the multitude of negative effects that these crises entail, including self-harm and potentially even suicide. This in turn leads to greater quality of life and improved care at reduced costs.

 BlueBird



diafyt

A big-data driven algorithm can simulate the regulation of blood sugar levels in humans according to a startup team. It's the first time researchers have shown, that an algorithm can anticipate the optimal insulin dosages. If the finding will be transferred on people with diabetes, it could lead to lowering the number of required insulin injections. Insulin is a very important drug for diabetics, but it is also fickle in some ways. It works great in healthy people because the pancreas can regulate sugar levels but for

patients who are ill, it's very difficult to modulate the correct levels. For this reason, creating a simulation of what a healthy pancreas would do naturally would be a significant medical breakthrough bringing diabetics one step closer to normal, healthy living. We are currently in the pre-launch of a diabetes fitness app that will implement this exact same algorithm. The team formed in May, a prototype is scheduled for September, and the actual launch is scheduled for December.



egoHEALTH

egoHEALTH has the technical and scientific expertise that strengthen the team's innovation and competition in the research, development and production of innovative medical devices. Our areas of activity include microbiological studies, biomedical engineering, disinfection and public health. egoHEALTH is introducing Stet Clean, an innovative and patented device which breaks down or eliminates the transmission of microbes caused by repeated stethoscope use. The stethoscope is the most-used medical device

and potential source of hospital-acquired infections. It won the 2016 product-innovation award at the International Ultraviolet Association World Congress. It uses ultraviolet-C light, emitted by LED and has a unique set of characteristics: It is lightweight, easily attached to the health professional's coat, practical, adaptable to all stethoscopes, technologically innovative, efficient and effective, safe for the operator and the patient, cost-saving, eco-friendly and rechargeable.





HealMet

M1 is our voice-interactive, home health station that collects major vitals through touch in seconds. It operates without being tethered to a smartphone, allowing operation for the non-tech savvy consumer. Collected health data is used for multi-user identification and simple interpretation

through alerts, reminders, and voice provided by Amazon Alexa. Our intention is to create simplistic smart alerts and reports for families, doctor's interpretations, educational interaction, and engagement in the overwhelming health care system.

HealMet



Hindsait

Hindsait is a leading artificial intelligence (AI) platform for better health care. Hindsait's AI platform enables individual payers, integrated health care delivery networks and pharmaceutical companies to improve quality of care and to reduce unnecessary services, errors and fraud. Hindsait's brilliance starts with its ability to acquire and translate physicians' "unstructured text" from patient charts within the context of clinical guidelines and regulatory require-

ments. These inputs drive machine learning and predictive analytics in Hindsait's AI SaaS platform that evaluates, scores and flags patient charts for specific actions. Hindsait's artificial intelligence (AI) platform is revolutionizing utilization management (UM) to reduce unnecessary health care services. The results are astounding: an improvement of 20-40% in the prevention of unnecessary services, resulting in several million dollars in savings per month.

Hindsait



nevisQ

nevisQ provides a smart security system that can prevent and detect falls in nursing care homes. Objects, people, and activities in rooms can be monitored and interpreted simply by installing intelligent baseboards. Unlike existing solutions like alert buttons, the person receiving care does not need to carry anything around with them. In addition to fall detection, our system also detects when a person gets out of bed in the night, and immediately switches the light on. nevisQ was founded in May 2016, by four founders. After

successfully developing the hardware and software for the first prototype, we recently completed the second prototype and installed it in our showroom. nevisQ is currently being funded by the German government's Exist Business Start-Up Grant. Its ability to interpret events in a room and detect human activity means our solution can be used in a variety of fields such as automated lighting control, alarm systems, and smart home applications like heating control.

nevisQ 



NonInvasive Medical Devices

Conventional cancer treatments are expensive and have side effects. NonInvasive Medical Devices (NIMD), a startup in its R&D stage, has developed an innovative device that can locally heat and kill cancer cells through thermal ablation. The technology is based on a microwave system with an applicator that is noninvasively placed above the treatment region. Nanoparticles which specifically attach to cancer cells are

injected into the tumor so that the cancer tumors are selectively heated and killed, while the surrounding tissue remains intact. NIMD's team consists of a diverse, passionate, and innovative group of scientists and engineers aiming at improving the quality of life for cancer patients. NIMD has finished its proof of concept stage, generated IP and performed animal studies. The company is currently raising its Series A round.

NIMD
NonInvasive Medical Devices 



NovioSense BV

NovioSense BV is a medical sensor company that develops cellphone-powered sensor devices for glucose monitoring in diabetes. Our first product is a non-invasive, wireless cellphone-powered sensor that measures glucose levels in tears. The device came into being in 2011, and since then, we have developed the first prototypes and entered clinical testing in Europe. In 2016, we will carry out Phase 2 clinical trials of the device on human volunteers. Current methods are invasive, require continuous calibration, and are extremely



expensive. NovioSense is developing a non-invasive device platform that can measure glucose in a variety of bodily fluids. The device is designed to compete with current invasive technologies on both accuracy and reliability. In the mass market for type 2 diabetes control, invasive devices are a block to market entry. By providing a non-invasive solution that's able to connect to any NFC-equipped phone, NovioSense opens up this market.



Quantum Base Ltd

Counterfeit products and device spoofing lead to huge losses – nearly \$200bn per year – in revenue in the pharmaceuticals industry, and 30% of non-genuine products contain no active ingredients. This means that millions of people with treatable diseases do not get the medication they need. Recent growth in the scale of this problem is being driven by relentless advances in modern technology; ubiquitous access to high-performance computing and manufacturing technologies is lowering the barrier to circum-



venting contemporary security technologies that are used as seals of authenticity. Quantum Base is bringing products to market that keep pace with this technological progress, allowing the identity of tagged products to be verified at the atomic level anywhere in the supply chain – a simple, affordable solution. Our solutions represent the frontier of device authentication and will provide robust security for many years to come, using only a smartphone and an inexpensive filter.



SpinDiag

One in 25 patients acquires an infection while in the hospital. Around 500,000 patients are infected in German hospitals annually, leading to 15,000 deaths per year. 30% of these hospital-acquired infections could be avoided with better processes and hygiene. Screening patients before they are admitted reduces hospital infections. However, conventional screening methods require 2-3 days to provide results. Hospitals are faced with choosing between the pre-emptive isolation of risk cases, which entails additional

costs of over €300 per day, or risking an infection, which also entails high additional costs as well as potential fatalities. SpinDiag provides an automated, PCR-based diagnostic platform for detection of multiple pathogens and resistances directly from patient samples. The extremely easy-to-use system consists of a disposable, low-price, DVD-sized lab-on-a-disk, and a portable PCR reader. This allows screening for drug-resistant pathogens in less than 30 minutes.



WearHealth

WearHealth is the AI-driven personal health assistance platform that learns from health experts and from data from wearables. We are a research spin-off from the Institute for Artificial Intelligence at the University of Bremen and have years of experience in dealing with data from wearables and machine learning. Due to increasing shortages in the global health workforce and avoidable health care costs attributed to non-adherence, there is a high demand for new solutions in the area of mobile-assisted health.

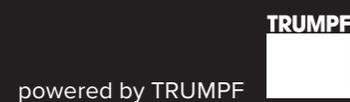
In response to this, we are building a context-aware personal health assistant (PHA) that can learn from health experts and from data recorded by commercially available wearables. Using these wearables, the first version of the PHA can recognize gestures such as pill intake, eating, and smoking, thereby helping patients adhere to their medication regimen. We are working together with our customers – health insurers, hospitals, and the pharmaceutical industry – to bring this solution to market.



PHOTONICS 4.0 describes how light will transform our work and social lives in the future. Light enables new applications in our industry, society, and environment with technologies such as advanced laser systems, image processing, and optical sensors. The success of future manufacturing in the era of Industry 4.0 will be determined by the efficiency with which complex manufacturing machines are integrated to incorporate smart human machine interfaces (HMI). The creation of a human industrial environment with high productivity and flexibility will be fueled by the use of next-generation photonics devices including intelligent sensors, augmented reality, and 3D printing.

In smart and connected manufacturing, advanced photonics technologies make it possible to combine energy and data transfer, data processing, secure communication, and storage – in new and revolutionary ways. Light will not only help us to enjoy a safer and more convenient lifestyle. It will also give us a deeper understanding of the world around us, powered by optical screening and detection technology.

PHOTONICS 4.0



founders
Erik Klaas
Arun Chhabra

year of launch
2014

8tree

8tree products enable aeronautics and automotive suppliers, airlines and maintenance-and-repair operators, auto repair and civil infrastructure organizations to improve inspection quality and efficiency by means of 3D vision and augmented reality (AR). 8tree products has been formally certified by Airbus. Early custo-

mers include Airbus and Boeing as well as their supply-chain and airline customers. Revenues are generated through a mix of product sales and recurring maintenance fees. A flexible hardware platform is the vehicle for delivering differentiated, application-specific software solutions.

address
Oberriederweg 14
88718 Daisendorf, Germany



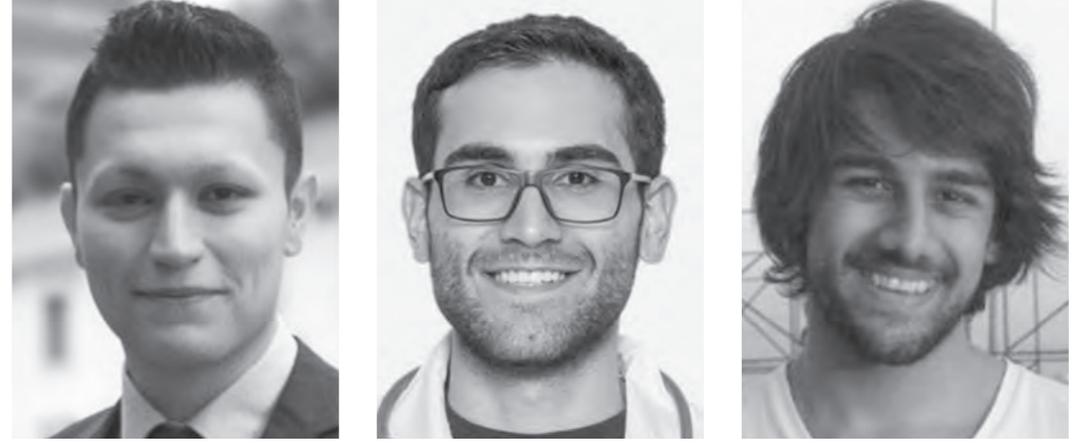
company
8tree GmbH
www.8-tree.com



BODLE Technologies

The total global wearable display market is expected to reach a volume of \$22.7b by 2023. Current display technologies are inherently rigid and power hungry, hindering the rapid penetration of wearables into the mainstream consumer electronics market. Our proprietary technology has particularly exceptional capabilities for producing colorful reflective displays in

which high resolution, low weight, and low power consumption are critical. Other applications, such as smart windows for infrared control and smart labels for security applications, are also under development. A revolutionary technology capable of manipulating light at the flick of a switch: our target markets are reflective displays, smart windows, and security applications.



Enigma Biotech

Enigma's founding vision is to distill cutting-edge, multi-disciplinary research into great products to help people learn about their body so they can lead healthier lives. We are building an optical sensor designed to be worn in-ear to measure, track, and analyze blood analytes, vital health markers, without a single drop of blood. Light-based sensors have the potential to accurately measure a myriad of blood values such as glu-

cose, blood gases, hemoglobin, and lactate, as well as to detect crucial physical readings, such as heart rate and core body temperature. We're eager to open up a new era in health in which users are able to see a comprehensive overview of vital measurements, detect and track trends, easily share insights with healthcare professionals and caregivers, and take an active role in managing their own health.





FaunaPhotonics

The ultimate goal of FaunaPhotonics is to bring to market an innovative and efficient sensor solution addressing the need for real-time monitoring of agricultural insect pests as well as non-target insects including pollinators. Safely controlling insect populations is one of the greatest dilemmas facing crop growers and agricultural consultants. There is a clear market need for automated monitoring of agricultural insect pests and pollinators, especially in relation to spraying decisions; that is, for a new technolo-

gy that will increase effectiveness against target species while at the same time mitigating effects on non-target species. The ability to systematically and efficiently detect, identify, and monitor insects is expected to have a highly positive impact on the agricultural sector. Optical remote sensing represents a proven capability to conduct in-field continuous monitoring of insect populations. The technology further promises to enable species-specific detection.



ioxp

Augmented reality (AR) for industrial learning scenarios and for transferring knowledge from one worker to another is made easy using the ioxp system. Step-by-step instructions projected directly into the worker's field of view can be created with minimal effort and even by the worker himself. The ioxp system uses a simple video recording of the correct work procedure to extract the necessary information for an augmented-reality representation. Another worker can then benefit from these instructions by recei-

ving the information on a smartphone or smart glasses. The extracted workflow can also be used for paper-based documentation or chapter-by-chapter tutorial films. Voice control or the use of smart glasses allows for hands-free reception of instructions. A live hand-tracking mechanism is used to warn the worker in case of danger or incorrectly executed work steps. Our clients use the system for quality assurance in production as well as for service documentation or remote maintenance.





LightFab

We enable the precision machining of transparent materials with high-power, ultrafast lasers for diversified applications. LightFab – 3D fabrication by laser light. Our innovative laser-production process makes 3D precision glass parts possible and is scalable for mass production. We print the parts directly from the customers' CAD data for markets as diverse as medicine, biology, electronics, chemistry, mechanics, optics, and the automotive and oil industries. Our prize-winning LightFab 3D printer

is the fastest machine for prototyping and the series production of 3D glass parts. We produce prototypes and series of 3D glass parts (e.g., for testing). We sell the LightFab 3D printer to enable customers to do the 3D glass production on their own. We offer to engineer dedicated mass-production systems for the tested glass products. We integrate our machinery and software in the customer's production environment. We also offer coached production services since our technology is so new.



LuxFlux

LuxFlux's vision is to take powerful measurement technology out of the lab and into the hands of customers. Near-infrared spectroscopy is a well-established method for obtaining the chemical fingerprint of organic materials. However, its cost and complexity have so far limited its use to facilities with trained personnel. LuxFlux combines micro-spectrometers with machine-learning algorithms. Our products' price points and ease of use open up new market segments and applications. We are targeting the incoming

goods inspection process, because our solutions can establish the identity of a substance and detect possible hidden defects within seconds. LuxFlux solutions have the potential to appeal to customers in a wide range of industries, such as agriculture, recycling, food, and life sciences. We currently have test operations in the polymer industry as well as in pharmaceutical production. We are looking for partners for test installations as well as distribution partners with contacts in relevant industries.



founders
 Frederick Lessmann
 André Gall
 Matthias Hecht
 Silas Aslan

year of launch
 2016

address
 Hermann-von-Helmholtz-Platz 1
 76344 Eggenstein-Leopoldshafen, Germany

company
 otego GmbH
 www.otego.de



otego

otego develops printed thermoelectric generators (TEGs) as an independent energy source for the Internet of Things (IoT). The rapidly growing number of connected IoT devices cannot just be powered by batteries – a sustainable energy solution is needed. otego's TEGs convert heat directly into electric power at the first sign of even the slightest temperature difference and they are completely maintenance-free. By using

ambient heat to power connected IoT devices, otego TEGs have the power to slash dependency on batteries. Founded in 2016, otego manufactures its innovative TEGs from a completely new, low-cost material using a patented high-volume production process, making the company the first manufacturer ready to produce low-cost TEGs suitable for mass applications.

OTEGO collecting energy

founders
 Heiko Hirschmüller
 Korbinian Schmid
 Michael Suppa

year of launch
 2015

address
 Kaffierstr. 2
 81241 Munich, Germany

company
 Roboception GmbH
 www.roboception.de



Roboception

Robotic systems visually acquire their environment in real time. Roboception's innovative sensor technology and data processing enable these robotic systems to organize, identify, and interpret sensory information for mapping and understanding their environment. Roboception's solutions allow customers across all robotic domains to generate real-time 3D data products that are dependent on time and location, and to equip robotic systems with robust and seamless infrastructure-free navigation. Based on a

"Sense. Reason. Act." approach, 3D technologies such as object localization/recognition, scene analysis, robotic manipulation, and application development complete Roboception's portfolio. The company's solutions include highly intuitive, user-friendly interfaces, parameterization, and programming, meaning a detailed knowledge of robotics is not required for their setup and operation. Networked application distribution and versatile, reusable software modules ensure compliance with Industry 4.0 concepts.

roboception



twip optical solutions

Twip is a spin-off from the University of Stuttgart. After receiving initial government funding, it pursued the development of smaller and lighter 3D measurement systems, ultimately leading to a new 3D measurement system with specifications beyond the current state of the art. Twip's goal is to create novel 3D geometric measurement solutions that can be used in production environments to assist manufacturing processes by

providing fast and reliable measurements. New systems and adaptable software make it possible to take measurements close to the production process, enabling inline quality assurance so products do not need to be taken to a measurement laboratory. This inline inspection enables 100% control over production and also saves costs – plus the measured data is available for all products, not just for random samples.

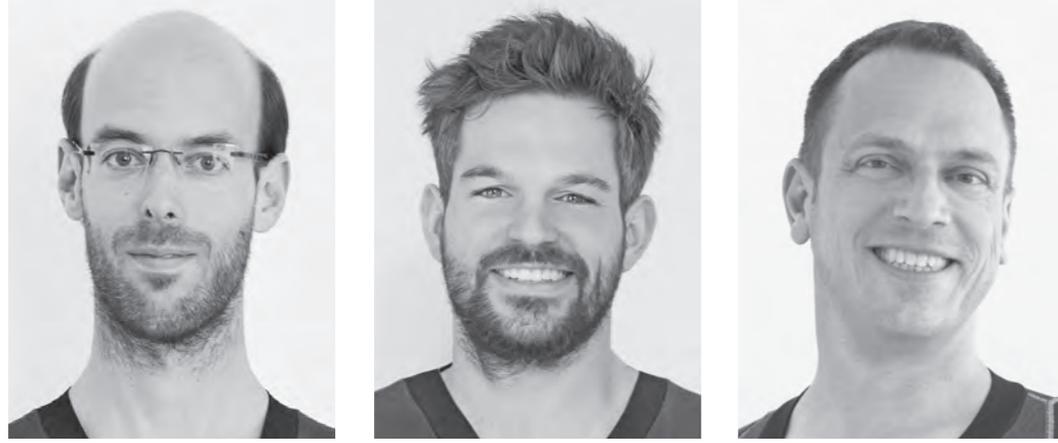


UrbanAlps | Stealth Key

The Stealth Key – the affordable mechanical key that can't be 3D-duplicated. It couldn't be simpler: an additively manufactured key that hides most of its mechanical security features internally, rendering the key unscannable. For millennia, keys have relied on external features – now, modern 3D metal printing lets us turn the

common house key inside out. No matter how many pictures or scans are made, keys like these cannot be illegally duplicated. They also cannot be scanned unless cut, thereby destroying them. Our patent-pending key is ready to change the entire industry.

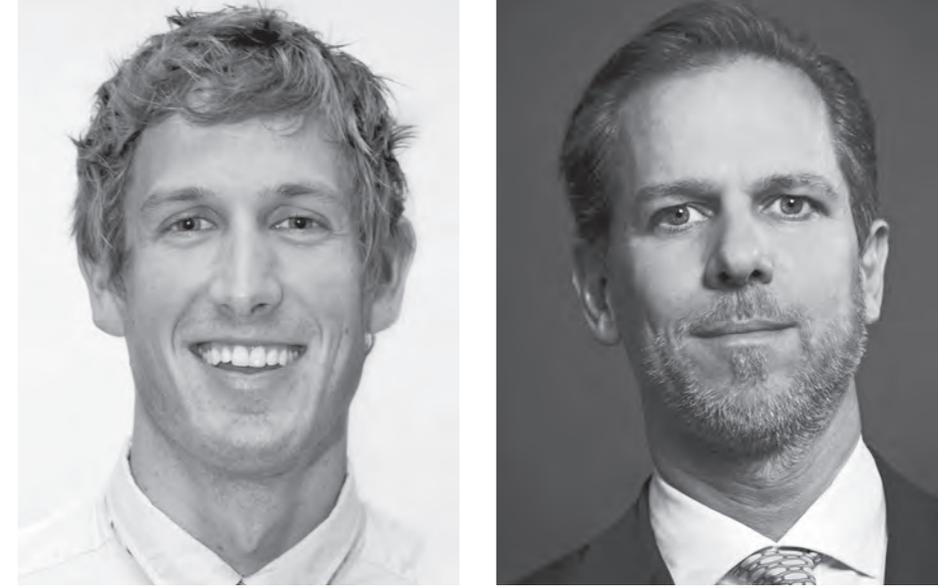




Wearable Life Science | ANTELOPE.CLUB

Searching online for swim training, Philipp discovered the Lake Zurich Swim Marathon instead – a 26K non-stop swim. He couldn't resist. Unfortunately, he had to be pulled out of the water after 10K. One year later, the race organizers gave him another try. This time, his friend Kay helped him. Kay is the founder of a chain of electrical muscle stimulation (EMS) studios and an EMS pioneer. He developed a specific EMS routine for Philipp and coached him. After three months of this preparation, Philipp tried again. And he made

it – through 12 hours of non-stop swimming. By chance, they met Patrick and Shahid. Patrick first discovered the benefits of EMS when he prevented an athlete from becoming paralyzed using a self-designed EMS routine. Electronics expert Shahid has an "everything is possible" attitude and could not resist the challenge: to develop a potentially life-changing wearable based on the latest scientific findings. And thus Wearable Life Science was founded at the beginning of 2014.



XARION Laser Acoustics

XARION has invented a laser-based acoustic transducer, which it markets internationally. This sensor is the world's first to detect sound solely by its ability to change the speed of light. It is based on a miniaturized laser interferometer and contains no mechanical moving parts. Its advantages include a perfectly linear frequency response, unprecedented sensitivity, and an extremely broad ultrasound frequency bandwidth in both air and liquids. The target markets include acoustic metrology, industrial process control, medical ultrasound

imaging, and the automotive sector. Key benefits:

- Medical imaging (photoacoustics): sharper images in less time.
- Industrial process control (acoustic emission): more reliable real-time feedback on process.
- Aerospace material testing (NDT): no contact gel required for ultrasonic structural health monitoring.
- Automotive (in-car communications): highly directive recording

Based in Vienna, XARION sells the transducer as the OEM and also acts as the licensor.



JURY





Frank Riemensperger

Frank Riemensperger has been Senior Managing Director of **Accenture** in Germany, Switzerland and Austria since 2009. He is responsible for strategy development and execution as well as Accenture's market development across these countries, covering 7,000 employees. Frank studied computer science in Germany and the USA.

"You do not need to visit Silicon Valley to experience innovative culture. Some of the best ideas are at your doorstep. CODE_n new.New Festival is the proof as it offers a unique platform for all relevant players of the digital ecosystem. CODE_n has managed to create an exceptional community over the years, and Accenture is excited to be part of it. We build the bridge between established and new players, between traditional and disruptive business models. What emerges from this encounter is always something new, something better, something that drives our business forward. In the age of digitization, this is what we have to invest in."



Dr. Frank Schlie-Roosen

Dr. Frank Schlie-Roosen is the head of the Photonics/Optical Technologies division at the **Federal Ministry of Education and Research**. Born in Duisburg, Germany, Dr. Schlie-Roosen completed his studies in social science before going on to perform research work from 1982 to 1984. Since 1985, he has been working for the Federal Ministry of Education and Research, where he obtained his PhD in 1986. From 2006 onwards, he has been the head of the ministry's Photonics/Optical Technologies division.

"I look forward to being part of the jury for the CODE_n16 CONTEST. With nearly 400 applicants from 40 countries and four exciting clusters, the contest will yield fascinating insights into the innovative trends we shall bear witness to in the coming years. Of course, I am especially excited about the developments underway in the photonics cluster at the moment, and the journey these products will undertake from the lab to the markets."



Carsten Knop

Carsten Knop is a senior business editor of the German daily »Frankfurter Allgemeine Zeitung« (**F.A.Z.**), based in the Frankfurt headquarters and in charge of the companies section of his paper. He contributes editorials and feature stories. In previous assignments with F.A.Z., Carsten Knop was based in San Francisco (2001 – 2003), New York City (1999 – 2001) and Düsseldorf (1996 – 1999). He was born in Dortmund, and educated at the University of Münster, Germany. Degree in Economics in 1993, he joined F.A.Z. in that same year.

"Where young people decide to be innovative and entrepreneurial, a media brand like F.A.Z. should be part of the equation. Our platform can help founders to shape the future."



Ulrich Dietz

A born entrepreneur, Ulrich Dietz set up his first company at the age of 19. He has headed **GFT** since it was founded in 1987 and remains the CEO at its helm today. Furthermore, he is an active member of a number of committees which lend support to startups and promote Germany as a prime international location for IT innovation. In 2011, he was named German Entrepreneur of the Year.

"CODE_n enables companies to take part in today's technological trends. The new.New Festival is taking it to the next level. This year's contest clusters – Applied FinTech, Connected Mobility, HealthTech and Photonics 4.0 – already significantly influence, shape and change our lives. Such developments will continue to quicken their pace even further in the years to come. Together with the 52 startup finalists and our top-notch partners, we are putting together a one-of-the-kind conference agenda that will make our festival an extraordinary experience for everyone."



Volkhard Bregulla

Volkhard Bregulla leads HP's Global Account in the Manufacturing Industry as well as the German and European Internet of Things (IoT) Program. Previously Mr. Bregulla managed the Global Accounts Organisation in Germany, Central Eastern Europe, Israel and Russia. Since joining HP in 1985 from Siemens AG, Volkhard Bregulla has held a series of executive management positions in regional and global business units, working for more than a decade out of the US West and East Coast as well as the Networking Division in France and has served on the Board of several of HP's equity investments and as Chairman of the Board of a HP subsidiary. Mr. Bregulla has a Bachelor's Degree in Electrical Engineering and a Business Master's Degree in Finance and Quantitative Methods.

"With a motivating environment and targeted support, I am convinced that we can all unleash tremendous creativity and innovative power and translate this into entrepreneurial action."



Martina Merz

Martina Merz is a member of the Board of Directors of the **Deutsche Lufthansa AG** headquartered in Frankfurt am Main, Germany, the **NV Bekaert SA** headquartered in Kortrijk, Belgium, the **VOLVO** Group, headquartered in Gothenburg, Sweden and **SAF-HOLLAND S.A.**, headquartered in Luxembourg. She graduated with a degree in mechanical engineering with an emphasis on manufacturing technology from the University of Cooperative Education in Stuttgart, Germany, and gathered almost 25 years of experience in various management positions at Robert Bosch GmbH.

"The digital disruption has an impact on many aspects of our everyday-life. How we all deal with it is key to our economic development and the well-being of societies. Both ecosystems „large R&D organisations“ and „start-ups“ can only excel within their ecosystem – and it is of huge mutual benefit to continuously optimize their interaction."



Dr. Peter Leibinger

Dr. Peter Leibinger is the Vice Chairman of the **TRUMPF GmbH + Co. KG** and President of the Laser Technology and Electronics Division. He was born 1967 in Stuttgart and studied mechanical engineering at the RWTH University in Aachen, Germany. Since 1994 he's holding partner of the TRUMPF GmbH + Co. KG. Leibinger serves in several honorary functions.

"Modern Industry is at a turning point. For the first time the gap between the digital world and the tangible world can be bridged. Light is the key competence of the future. Digital Photonic Production becomes reality. Simultaneously we are experiencing the convergence of B2B- and B2C-Business. The concept of the sharing economy comes to industry in the shape of Industry 4.0. There is no better place to experience all of this than at the CODE_n new.New.Festival. This is why TRUMPF is fully engaged in the CODE_n new.New.Festival."



Prof. Dr. Peter Weibel

Born in Odessa in 1944, Peter Weibel studied literature, medicine, logic, philosophy, and film in Paris and Vienna. He became a central figure in European media art on account of his various activities as artist, media theorist, curator, and as a nomad between art and science. Since 1999, Peter Weibel is Chairman and CEO of the **ZKM | Center for Art and Media Karlsruhe**. He was granted several international honorary doctorates and awards.

"Innovation, creativity, disruption are the new paradigms for our data driven society. The equation for the analog world of the 20th century was formulated by F.L. Wright: Machinery, Materials and Men. My equation for the digital world of the 21st century is: Media, Data and Men. Startups are at the core of the digital revolution. The CODE_n CONTEST is a wonderful opportunity to encounter a selection of the best startups on a global scale."

PARTNERS



CODE_n contact person
Barbara Mülert
Marketing & Communications
Barbara.Mulert@accenture.com

company
Accenture GmbH
www.accenture.de
address
Campus Kronberg 1
61476 Kronberg im Taunus, Germany

CODE_n contact person
MinR Dr. Frank Schlie-Roosen
Directorate-General 5
Key technologies | Research for Innovation
Head of Unit 513: Photonics/Optical Technologies

company
Federal Ministry of Education and Research
Bundesministerium für Bildung und Forschung
www.bmbf.de/en/index.html
address
Kapelle-Ufer 1, 10117 Berlin, Germany



Accenture is a leading global professional services company, providing a broad range of services and solutions in strategy, consulting, digital, technology and operations. Combining unmatched experience and specialized skills across more than 40 industries and all business functions – underpinned by the world's largest delivery network – Accenture works at the

Accenture

intersection of business and technology to help clients improve their performance and create sustainable value for their stakeholders. With approximately 375,000 people serving clients in more than 120 countries, Accenture drives innovation to improve the way the world works and lives.



Federal Ministry of Education and Research

Education and research are the foundations for our future. The promotion of education, science and research by the Federal Ministry of Education and Research represents an important contribution to securing our country's prosperity. Education – Our responsibility in the area of education addresses every stage of human life, beginning with early childhood learning through to continuing education and lifelong learning. We share responsibility with the Länder in the fields of non-school vocational training, training assistance and continuing education. Research – In a country whose prosperity is built on the innovation strength of its industry research excellence is a must. Therefore we launched the High-Tech-Strategy which currently is further developed

to a comprehensive innovation strategy. In the budget period 2016 we aim to spend € 16,4 billion to achieve our targets – thereof € 5.5 billion for promoting institutional research. Another € 700 million are targeted towards project funding in the field of Key Enabling Technologies – amongst which € 100 million are addressing photonics. Bringing together science and industry to secure excellent and fast innovation are in the focus of our promotional concept.

GFT Technologies

GFT

GFT Technologies SE (GFT) is a business change and technology consultancy trusted by the world's leading financial services institutions to solve their most critical challenges. Specifically defining answers to the current constant of regulatory change – whilst innovating to meet the demands of the digital revolution. GFT brings together advisory, creative and technology capabilities with innovation culture and specialist knowledge of the finance sector, to transform the clients' businesses. Utilising the CODE_n innovation platform, GFT is able to provide

international start-ups, technology pioneers and established companies access to a global network, which enables them to tap into the disruptive trends in financial services markets and harness them for their out of the box thinking. Headquartered in Germany, GFT achieved consolidated revenue of around EUR 374 million in 2015. The company is represented in twelve countries with a global team spanning approx. 4,500 employees. The GFT share is listed on the Frankfurt Stock Exchange in the TecDAX (ISIN: DE0005800601).

CODE_n contact person
Bernd-Josef Kohl
Bernd-Josef.Kohl@gft.com
+49 711 6200420

company
GFT Technologies SE
www.gft.com
address
Schelmenwasenstr. 34
70567 Stuttgart, Germany

Hewlett Packard Enterprise



Hewlett Packard Enterprise is an industry leading technology company that enables customers to go further, faster. With the industry's most comprehensive portfolio, spanning the cloud to the

data center to workplace applications, our technology and services help customers around the world make IT more efficient, more productive and more secure.

CODE_n contact person
Bernd Gill
Leiter Service Innovation
bernd.gill@hpe.com
+49 7031 14-0

company
Hewlett Packard Enterprise GmbH
www.hpe.com
address
Herrenberger Str. 140
71034 Boblingen, Germany

CODE_in contact person
 Marco Holzer
 Leitung Produktmanagement &
 Logistik Services LT
 Marco.Holzer@de.TRUMPF.com



TRUMPF

The high-technology company TRUMPF provides manufacturing solutions in the fields of machine tools, lasers and electronics. These are used in the manufacture of the most diverse products, from vehicles, building technology and mobile devices to state-of-the-art power and data storage. TRUMPF is the world technological and market leader for machine tools used in flexible sheet metal processing, and also for industrial lasers. In 2015/16 the company – which has

approximately 11,000 employees – achieved sales of 2.8 billion euros (preliminary figures). With almost 70 subsidiaries, the TRUMPF Group is represented in nearly all the countries of Europe, North and South America, and Asia. It has production facilities in Germany, France, Great Britain, Italy, Austria, Switzerland, Poland, the Czech Republic, the USA, Mexico, China and Japan. For more information about TRUMPF go to www.trumpf.com

company
 TRUMPF GmbH + Co. KG
www.trumpf.com
address
 Johann-Maus-Str. 2
 71254 Ditzingen, Germany

CODE_in contact person
 Prof. Dr. Boris Hofmann
 Director Business Development
 boris.hofmann@aesculap.de



B. BRAUN

B. Braun is one of the world's leading manufacturers of medical devices and pharmaceutical products and services. With over 56,000 employees in 64 countries, B. Braun develops high quality product systems and services for users around the world. In 2015, the Group generated sales of approximately €6.13 billion. Every service provided by B. Braun incorporates the entirety of our knowledge and skills, the company's deep understanding of users' needs – and 175 years of extensive expertise. With its

constantly growing portfolio of effective medical care solutions, B. Braun makes a substantial contribution towards protecting and improving people's health. In developing its products, product systems and services, B. Braun acts like a sparring partner. A companion who knows their counterpart. Who wants to do the best for them. A companion who promotes developments through constructive dialog and the motivation to improve things. And enables solutions that are both evolving and progressive.

company
 B. Braun Melsungen AG
www.bbraun.de
address
 Carl-Braun-Str. 1
 34212 Melsungen, Hessen, Germany

EnBW



As one of the largest energy companies in Germany, we supply electricity, gas, water and energy-related products and services to approximately 5.5 million customers. EnBW decided at an early stage: We want to play a reliable and influential role in reshaping the energy system. Renewable energies, digitalization, innovations and transformation are our guiding principles. We already realigned our business model three years ago and have rigorously implemented

our strategy since then. We are countering the foreseeable fall in earnings from conventional generation and trading by expanding generation from renewable sources of energy, expanding the stable grids business and engaging in an innovation and service-based campaign to promote business in the area of "Customer proximity". EnBW views itself as an energy company that is active along the entire value chain.

CODE_in contact person
 Manuela Maurus
 m.maurus@enbw.com
 +49 160 9697394
 Christine Wienhold
 c.wienhold@enbw.com
 +49 151 46744164

company
 EnBW Energie Baden-Württemberg AG
www.enbw.com
address
 Headquarters Karlsruhe
 Durlacher Allee 93
 76131 Karlsruhe, Germany

Vector Informatik



Vector Informatik is the leading manufacturer of software tools and embedded components for the development of electronic systems and their networking with many different systems from CAN to Automotive Ethernet. Vector was founded in 1988 and has since then accompanied the development of automotive electronics at all OEMs worldwide. The Vector engineers are the renowned experts when it comes to new challenges in automotive IT. Currently, we are sought for topics like functional safety, cyber security, Advanced Driver Assistance and fully automated driving, e-mobility or the like. Vector focuses on the provision of the under-

lying infrastructure and leaves the application to the OEM or Tier 1 supplier. Vector tools and services provide engineers with the decisive advantage to make a challenging and highly complex subject area as simple and manageable as possible. More than 1,700 employees work on electronic innovations for the automotive industry every day. Worldwide customers in the automotive, commercial vehicles, aerospace, transportation, and control technology industries rely on the solutions and products of the independent Vector Group for the development of technologies for future mobility.

CODE_in contact person
 Carmen Katz
 +49 711 806705361
 carmen.katz@vector.com

company
 Vector Informatik GmbH
www.vector.com
address
 Ingersheimer Str. 24
 70499 Stuttgart, Germany

INITIATED BY



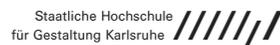
GLOBAL PARTNERS



INNOVATION PARTNERS



HOSTS



SUPPORTERS



EVENT PARTNERS



COMMUNITY PARTNERS



MEDIA PARTNERS



SPONSORS



PUBLISHED BY

GFT Innovations GmbH, Schelmenwasenstr. 34
70567 Stuttgart, Germany | www.code-n.org

CONCEPT

GFT Innovations GmbH

GRAPHIC DESIGN

Baranek & Renger | www.baranek-renger.de

PRINTING

Druckerei Würth | www.wuerthdruck.de

IMAGE CREDITS

All images from our finalists, partners and jury:
copyright at each finalist, partner or jury.