

HUAWEI PEOPLE

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**Paving the Way for All
Intelligence**

**Speech by Eric Xu at Huawei
Connect 2024**

VOICE

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Paving the Way for All Intelligence

Speech by Eric Xu at Huawei Connect 2024

By Eric Xu / Deputy Chairman, Rotating Chairman

Good morning, everyone! Welcome to Huawei Connect 2024. I hope you enjoy your time here in Shanghai.

At Huawei Connect 2018, Huawei launched its AI strategy and full-stack, all-scenario AI portfolio, positioning AI as a general-purpose technology. At the same event in 2021, we introduced our Pangu models designed to help industries go intelligent. AI has advanced by leaps and bounds in the intervening years, capturing the interest of global investors, industries, and governments alike. Over the past six years, we have steadily pressed ahead with strategic AI development, culminating in our All Intelligence Strategy, which we introduced at last year's Huawei Connect.

Every industry and enterprise has its own unique story when it comes to intelligent transformation. I've heard of many successes, but also a fair amount of uncertainty. Today, I'd like to take this opportunity to share our observations, thoughts, strategies, and experience.

AI is becoming the most impactful technology for industries

To begin with, let's look at how far different industries have come in commercial AI adoption. From a commercial application standpoint, no other technology has had such a profound impact in such a short amount of time. According to research from McKinsey and Stanford University, AI adoption in all the covered industries is

high across three main functions: product and/or service development, marketing and sales, and service operations. Gartner's 2024 CEO Survey reveals that CEOs are very optimistic about AI.

Overall, ongoing advancements in AI are driving more in-depth intelligent transformation across industries, laying the groundwork for All Intelligence.

Envisioning the future of enterprises in the age of AI

As companies set out on this journey, they hope to quickly harness AI for value creation today while also honing their competitive edge for the future. At Huawei, we've been exploring how to help our customers succeed on both fronts. In this regard, it's crucial to first envision what intelligent enterprises will ultimately look like, and then use that vision as a guide for the strategies and actions that we employ today.

Huawei has years of experience with its own intelligent transformation, and we've been helping a wide range of industries go intelligent too. Based on this experience, we've envisioned the future of intelligent enterprises in the age of AI. I'd like to discuss this vision in more detail, including what intelligent enterprises will look like and what features they will have.

These enterprises will be characterized by what we call the "six A's": They will have an Adaptive User Experience, Auto-Evolving Products, Autonomous

Operations, an Augmented Workforce, All-Connected Resources, and AI-Native Infrastructure.

The first four A's are the results of intelligent transformation.

The first “A” focuses on how future enterprises will serve their customers. We believe it's through an Adaptive User Experience. That is, intelligent enterprises will perceive and understand user behavior, requirements, interests, tastes, and environmental changes, and then adapt to provide services that best meet user needs. The ability of products to promptly respond to a massive range of personalized requirements needs to be designed from the start – it's not a matter of incremental tailoring. For example, AI-powered educational tablets will be able to automatically adjust curriculum and difficulty levels based on a student's age, learning progress, comprehension skills, and test results, giving each student a unique learning experience at different stages of development. The transition from a predefined user experience to an adaptative user experience is a significant advancement, and will be necessary in the future intelligent world.

The second “A” stands for Auto-Evolving Products. It relates to innate product functionality – the ability to auto-evolve. In the age of AI, products will be able to self-learn, iterate continuously, adapt to changes, self-optimize, and self-evolve. For example, self-driving vehicles will be able to learn by themselves – the more they drive, the better they drive. The shift from digital to intelligent products is a major advancement that will reshape the competitive landscape. Every enterprise needs to think about adding intelligent capabilities to its products.

The third “A” stands for Autonomous Operations. It means closed-loop autonomous operations for all business flows, from sensing and planning to decision making and execution. Take smart ports, for example. Their intelligent planning platforms can automatically generate operation plans, while autonomous container trucks handle horizontal transportation. Many companies have been working towards automation for years now, and truly autonomous operations will bring a massive boost to efficiency. Every enterprise should consider using AI to transform and enhance operations more broadly and deeply.

The fourth “A” – Augmented Workforce – illustrates

the future of employee experience and work methodology. It describes a workplace where every employee will have an intelligent assistant that understands their needs, helping them complete tasks more efficiently and with higher quality. For example, an assistant app can give field maintenance engineers quick access to mobile base station information such as fault location, root causes, and suggestions for handling the fault. AI exists to benefit humanity, and enhancing employee experience is key for any enterprise to get a head start in the age of AI.

The remaining two A's are the building blocks of AI. All-Connected Resources is about connecting every part of an enterprise, from assets and employees to customers, partners, and ecosystems. All business objects, processes, and rules will be digitalized. Of course, the more information derived from connected resources, the better, but more importantly, the quality of information is key. Digitalization on a deeper and broader scale will generate the much-needed data for enterprise intelligence.

The sixth and last “A” is AI-Native Infrastructure. There are two aspects to AI-Native Infrastructure: “ICT for Intelligence” and “Intelligence for ICT”. ICT infrastructure needs to be built out systematically to keep up with the needs of intelligent applications – that's ICT for Intelligence. And on the flip side, AI technology itself will be vital for managing the O&M of future ICT infrastructure, as well as assuring experience. This is what we call Intelligence for ICT.

With these six A's, we're trying to capture what a future intelligent enterprise will look like. We hope these can help provide some food for thought on how your company can use AI to position itself for success in the intelligent world to come.

Advancing Huawei's All Intelligence Strategy

At Huawei Connect 2023, we announced our All Intelligence Strategy. This strategy addresses a broad range of areas, and today I'd like to discuss our thoughts on seven specific initiatives.

I. Innovative architecture for sustainable computing solutions

Let's start with computing power. Intelligent transformation is a long-term process, and it's founded on

computing power – not only now, but in the future. So moving forward, sustainable computing power will be the cornerstone of continuous advancements in AI.

Computing power largely depends on semiconductor manufacturing process nodes. However, the reality is that US restrictions on AI chips for China are unlikely to be lifted anytime soon, and the Chinese mainland will lag behind in semiconductor manufacturing process nodes for a relatively long time. This undermines our ability to make advanced chips. It's a challenge that we have to confront when developing computing solutions. In the Chinese mainland, sustainable computing power can only be achieved with chip manufacturing process nodes that are practically available.

These challenges are real, but they also present opportunities and new possibilities. They are what motivate us to keep innovating. AI is becoming the predominant source of demand for computing power – and this trend is driving structural changes in computing systems. We're now looking at how to increase computing power at the system level rather than the individual processor level.

These structural changes give us the opportunity to create a new computing architecture – a viable path for the independent and sustainable development of the computing industry.

We want to seize the opportunities presented by this AI revolution based on chip manufacturing process nodes that are practically available. And so, our strategy is to create a new computing architecture that is built on synergistic innovation across computing, data storage, and networks. We will also develop computing supernodes and clusters to sustainably meet long-term demand for computing power.

II. Huawei Cloud's upgraded stack for AI: Powering industries with AI

The technological breakthroughs we've seen in foundation models have greatly accelerated advancements in AI. It seems like every industry is talking about foundation models, trying to build their own AI computing infrastructure, or even train their own proprietary model these days. This is undoubtedly great news for computing solution providers like Huawei. But we don't believe this is viable in the long term. As always, we want our customers to achieve ongoing, lasting success, which is key to our own sustainable development. So today, I'd like

to share some of our thoughts on this topic.

Not every company needs to build their own large-scale AI computing infrastructure. AI servers, especially AI computing clusters, are different from general-purpose x86 servers in that they need more advanced power supply and cooling systems. As foundation models become increasingly larger, demand for AI computing keeps growing, and AI servers need to be constantly upgraded. If companies want to keep up by upgrading their own data centers, they may end up under-utilizing their resources or falling behind demand.

AI hardware products have fast iteration cycles, with an average one- to two-year gap between generations. Large models are rapidly evolving. Limited by the computing power of each generation, companies need to combine multiple generations of hardware to train a large model, but this greatly complicates resource scheduling. Older generations end up handicapping the performance of the newer generations, which in turn undermines the training of large models.

Companies also face O&M challenges. AI technology is evolving rapidly these days, so multiple generations of AI products tend to co-exist in a single DC. O&M is getting difficult and requires in-depth expertise, which poses a major challenge for companies that only have IT maintenance capabilities.

These challenges will persist for some time. Beyond building their own AI computing infrastructure, enterprises might want to consider alternatives to get the AI computing power they need in the way that works best for them.

Not every company needs to train a proprietary foundation model. Data is key to foundation model training. Yet it's difficult and costly to obtain enough quality data for pre-training a foundation model with roughly 10 trillion tokens. The number of model parameters keeps growing, which makes iteration and optimization extremely difficult. Iterative model training usually takes months or even years. This can greatly delay the benefits of AI in core business areas. And beyond that, talent is hard to come by. Foundation model technologies are evolving every day, and there is a distinct lack of technical experts with practical experience in this area.

Not every application needs a large model. Huawei's Pangu models have been used in many industries, and our experience suggests that a 1-billion-parameter model is

enough for scientific computing and prediction scenarios, such as rain forecasts, drug molecule optimization, and technical parameter predictions. Models like this are also widely used for devices like personal computers and smartphones. Models with over 10 billion parameters are sufficient for domain-specific tasks, like natural language processing (NLP), computer vision (CV), and multi-modal tasks. Examples include knowledge base question answering, coding, banking agent assistants, and safety risk detection. Complex NLP or multi-modal tasks can be handled with 100-billion-parameter models.

In our view, companies need to choose the right models for the right scenarios, and use a mix of models to address their pain points and create value.

So far, I've shared our thoughts on AI development. And we believe that if a company doesn't have the ability or resources to build their own AI computing infrastructure or train their own foundation model, then cloud services are a more feasible, sustainable option. Huawei Cloud has upgraded its entire stack for AI to address these challenges. Our goal is to give every company access to on-demand AI computing power, and enable more efficient model training and inference.

First, Huawei Cloud is continuously building up its Ascend Cloud Service to give companies easy access to massive AI computing power. With Ascend Cloud Service, companies don't need to build or upgrade their own data centers, or operate or maintain AI computing infrastructure. With end-to-end synergy across computing, data storage, and networking, Ascend Cloud Service has been used to successfully train a model with over 100 billion parameters, uninterrupted for 40 days straight.

Second, Huawei Cloud has upgraded the ModelArts services to provide out-of-the-box access to mainstream foundation models, including Pangu models, open-source models, and third-party models. This means companies don't have to prepare tons of data or go through multiple iterations for foundation model training themselves. Huawei Cloud also provides complete toolchains for model tuning, deployment, and testing, lowering technical barriers to model fine-tuning and incremental training.

Third, Huawei Cloud is going all out to build up Pangu Models 5.0. This series includes models with over 1 billion, 10 billion, 100 billion, and even more parameters. We've developed this range of models so all companies can find the best fit for their unique needs

and business scenarios. We've also established a model developer community with more than 100 models, offering companies a broader range of choices.

To sum up, cloud services are the best option for many companies that are looking to incorporate AI into their business. By providing Ascend Cloud Service and AI model services, we aim to give every company real-time access to on-demand AI computing power, and enable more efficient model training and inference.

Huawei Cloud's systematic security capabilities: Ensuring the security of large model training & inference

It's important to note that AI model training and inference on the cloud has brought about new security challenges. In response, Huawei Cloud has greatly enhanced its security capabilities.

Our security approach is to ensure defense by design for the most severe attacks. Based on zero trust, we've built seven layers of defense, covering physical security, identity verification, networks, applications, hosts, data, and O&M. We've also developed a unified security operations center. This security posture has helped Huawei Cloud successfully defend against 1.2 billion attacks each day, ensuring zero service interruption, zero data loss, and regulatory compliance.

In terms of security mechanisms, Huawei Cloud's Graded Security Cloud provides customers with a secure digital space, with support for both physical and logical isolation. Cloud platform operations are both transparent and auditable so customers can use cloud services with confidence.

In terms of security technology, Huawei Cloud offers an end-to-end, full-stack data security protection solution to manage the entire data lifecycle at the hardware, software, and app layers. This guarantees comprehensive data security throughout data movement, model training, and inference, and ensures the end-to-end security compliance of training data and generated content.

In terms of intellectual property (IP) infringement, Huawei will defend our customers against any third-party IP infringement claims related to content generated by Huawei Cloud large model services, and will compensate customers for the losses, costs, or expenses incurred as the

result of any final judgment or settlement.^[1]

III. Harmony Intelligence: Providing an intelligent experience across all scenarios

Devices are a crucial part of an AI-empowered future. Huawei was the first company to bring AI to smartphones. Back in 2017, we launched the HUAWEI Mate 10 smartphone with AI chips. It was the first phone with AI capabilities for imaging, translation, and other functions. With this device, we kicked off the age of Mobile AI.

Now, we find ourselves in the age of foundation models. With architecture that maximizes synergy between devices, chips, and cloud, we have deeply integrated AI technology into HarmonyOS. The result is Harmony Intelligence, with AI at its core. It is powered by intelligence at all layers, from the kernel to system apps. It allows for more open ecosystem-wide collaboration, as well as more trustworthy privacy protection and security protection.

With Harmony Intelligence, our smart assistant Celia is evolving into an AI agent, capable of more intuitive multi-modal interaction and more converged sensing. Celia will be able to accurately perceive user intent as well as the digital and physical worlds, and offer personalized content and intelligent services for all different types of scenarios.

Together with HarmonyOS ecosystem partners, we will take the intelligence of products further to better meet consumer needs across all scenarios, from office and learning to lifestyle and entertainment. And we are implementing tiered exposure of AI model capabilities and controls to support third-party apps and foster a thriving HarmonyOS-native app ecosystem.

Overall experience, not computing power, is central to on-device AI

Equipping devices with AI capabilities has become the new norm. These days we see all sorts of AI phones and AI PCs. But how do we define what a “smart device” is in the age of AI? Opinions on this vary throughout the industry.

Our position is that user experience should always come first. Smart device users are more interested in overall experience than in obscure technical specs, such

as chip process nodes, Tera-FLOPS, and the number of model parameters. So we advocate that overall experience – not computing power – should be central to on-device AI.

With this as our starting point, Huawei has teamed up with the Institute for AI Industry Research at Tsinghua University to propose standards for defining the intelligence levels of AI-powered devices, from L1 to L5. Our goal is to give consumers a more distinct feel for the capabilities of different AI-powered devices, and to promote industry consensus on the evolution of AI-powered device capabilities. The hope is that consensus can help drive coordinated development across the industry.

Specifically, we’ve adopted an experience-centric approach for quantifying intelligent user experience. We hope to deliver a better experience by reaching higher levels of intelligence in AI-powered devices. And we look forward to working with all industry players to further refine these standards and propel coordinated development in on-device AI.

IV. Autonomous Driving Network (ADN): Reshaping network experience and O&M

In the network industry, Huawei was the first to advocate using AI for telecom networks, and we proposed the concept of an Autonomous Driving Network (ADN) back in 2018. Now, we are integrating the Telecom Foundation Model and digital twins into ADN. And we are working with the TM Forum, China Mobile, and other partners to support level-4 high autonomous networks in high-value scenarios. We aim to gradually reach level-4, and eventually level-5 full autonomous networks.

In terms of ADN for Telcos, we are committed to providing superior user experience with zero wait, zero interruption, and zero touch. We also aim to support simplified O&M with self-configuration, self-healing, and self-optimization.

At the same time, we’ve started applying ADN to enterprise networks, because O&M in this domain has its fair share of challenges too. First, it’s difficult to guarantee a positive experience for employees in a fully wireless office with huge demand for cloud-based applications and video. Second, O&M workloads grow in scope and complexity as networks grow larger, whether it be office and production networks, data center networks, branch networks, or cloud networks. And this is further

compounded by increased diversity of network elements.

Today, we are introducing ADN for Enterprises, which will guarantee zero service delays, zero network disruptions, zero-wait service provisioning, and zero security risks.

V. Autonomous driving solutions: Prioritizing safety and experience, and paving the way for a driverless future

Autonomous driving for vehicles was one of the key focuses of our initial AI investment, because the end goal of autonomous driving is fully unmanned driving – one of the most challenging AI applications out there. Huawei's ADS 3.0 allows for more accurate autonomous driving decisions, more efficient mobility, more human-like driving experience, and greater driving safety. The solution's Navigation Cruise Assist (NCA) enables one-tap automatic cruising – on both public and internal roads – to the parking lot at your destination, whether it's above or underground. We've also upgraded our all-directional collision avoidance system to support emergency braking in a wider speed range and all-directional obstacle avoidance.

These advances have really given consumers a feel for how much intelligent driving can improve their overall mobility safety and experience. Chinese consumers are already very familiar with the value it provides, so many of the cars people buy these days are equipped with an advanced intelligent driving system. In essence, intelligent driving capabilities have become a key consideration for Chinese consumers when they're looking to buy a new car.

Moving forward, we will leverage fusion sensing technology to evolve ADS and gradually build up to several key goals. We will enable autonomous driving on highways; safe, stable driving on urban and suburban roads; and versatile driving across different terrains in rural and mountainous areas. We will also provide auto valet parking with features like zero scratches and zero software crashes. Through proactive safety, we will deliver enhanced, all-directional collision avoidance. These are our future goals for key driving scenarios. Our ultimate goal is to enable unmanned driving, and we will keep working hard to make it a reality.

VI. Jointly building ecosystems and creating a unified developer platform for shared success

Ecosystem development has always been a key component of our overall strategy. We have and will

continue to build up ecosystems together with our partners, and will keep expanding our unified developer platform to promote shared success. From 2017 to 2019, we began our work on multiple ecosystems, like those for Huawei Cloud, Ascend, Kunpeng, and HarmonyOS.

In 2024 and over the next five years, Huawei will invest even more into ecosystem development in an effort to guide and drive broader development in the computing and device industries. Our goal is to offer the world a second option for computing, and a third option for mobile OS.

VII. Advocating and practicing AI for good: Contributing to human, societal, and environmental well-being

AI has an unlimited set of applications, but they all come down to serving people. At Huawei, we advocate and practice AI for good.

We believe that AI should serve people by improving efficiency and quality of life. AI can enable the digital transformation of industries, reshaping production and paving the way towards an intelligent world. We aim to develop AI systems that are accessible to every person, home, and organization.

AI should be used for good – to create greater value for society. During the design, development, and use of AI technologies, it's crucial to carefully evaluate their potential and long-term impact on society, and take necessary measures to prevent harmful application.

AI should be used to protect the natural environment and promote sustainable development. It's important to actively leverage AI to study and address issues of global concern, such as the United Nations' Sustainable Development Goals.

The age of All Intelligence is here. It is unlocking new opportunities and new challenges for everyone and every enterprise. So let's work together to pave the way for All Intelligence, providing every person with an intelligent personal assistant, helping every company become an intelligent enterprise, and powering every vehicle with autonomous driving.

Thank you!



^[1] Subject to the terms and conditions of individual contracts.

The Call of the Uncharted Realms: My Passion for Adventure

By Lukas Cavigelli / Switzerland



“What? Do you literally favor extreme sports? And you ride a Kawasaki? No way!”

I was introduced to motorcycling by chance and it lit a fire in me. Seeing me go in for an extreme sport so passionately, the people around me are blown away, having difficulty picturing me, who was laid-back and bookish, as a guy who is into the motorcycle racing scene.

But only I know why. When I put on my helmet and ride down the road in my riding suit, I feel a different heartbeat and power – the real me, fast, efficient and focused, but nothing flashy.

Yes, nothing excites me more than going on a road less traveled and exploring new places constantly in pursuit of adventure, which is exactly what fuels my passion for working and living.

“Would You Like to Be Part of Our Exploration of the Future?”

In autumn 2019, I was working on a postdoctoral research project at Swiss Federal Institute of Technology



Racing in Ibergereg, Switzerland in 2023

“ *We want this to be an open platform for the exchange of ideas,” he said, “where everyone is free to explore, to make bold assumptions and to verify new ideas.* ”



Working with my small development kit

in Zurich. One Wednesday morning, Prof. Benini, my mentor, told me: “Lukas, there are some visitors from Huawei. Would you go for a chat?”

At that time, industry visitors often came to our laboratory to discuss collaboration. However, that was the first time we had ever been in contact with Huawei.

“Huawei? What kind of cooperation projects do they have for us?” Excited about such a new possibility, I walked into the meeting room.

I was greeted by Denny, Bill and Albert, three experts from Huawei. After a brief introduction, Bill cut to the chase and asked me a question that quite surprised me: “If you had the opportunity and the money to do your own research, what kind of research would you choose? What would you do?”

The question completely caught me off guard. And I thought: Are you kidding? This is the first time we meet, and you are already offering to engage me in independent research? Anyway, I presented my research interests and topics, before asking them questions that had been on my mind: Can we automatically optimize digital circuits for energy efficiency? Can we train an artificial intelligence (AI) model to do this?

My questions got the three experts interested and they apparently wanted to know more about it, so they asked me some more questions. It was more like a meeting that went beyond the existing knowledge and focused more on the logical reasoning, concepts and intuition that

are typical of research work.

“Lucas,” one of them said to me, “it was nice talking with you. Your ideas are definitely worth a try! I understand your quest for perfection and efficiency, but not all learning is perfect the first time. We can improve it together!”

These words, which I still remember fondly, touched my heart.

Then I saw them smiling to each other in an affirmative way – a scene so surreal. I realized that this was an interview. According to them, Huawei was going to set up a new Research Center in Zurich, Switzerland to explore future computing systems and needed talent for it.

A few days later, I met Moses, the first director of Huawei’s Zurich Research Center, outside my school. As we sat down at a café nearby and chatted over coffee, Moses began to talk about his vision for the future, describing a working environment that would be full of innovation and collaboration. I was impressed by the anticipation of and passion for the future, as was unmistakably embodied in his sparkling eyes.

“We want this to be an open platform for the exchange of ideas,” he said, “where everyone is free to explore, to make bold assumptions and to verify new ideas.”

My concerns gradually dissipated, replaced by a vision and anticipation of the future. This was my second interview, but it was more of an in-depth conversation and

“ *Together we were more efficient. Soon we found a key issue. In current algorithms, each memory access was treated as a separate computing layer; this was inefficient because treating each memory read as a separate computing process slowed down the overall speed.* ”

collision of minds. I felt recognized and valued. Finally, Moses looked at me with a smile, “We need innovators like you. Would you like to be part of our exploration of the future?”

I nodded. It would be a new adventure, a completely new journey of discovery.

“Double It Again?! How Is This Possible?”

In March 2020, I joined Huawei Zurich Research Center and led a team in working on AI-related technical architectures.

One morning my phone rang suddenly. It was a video call from my colleague Meng in China. He told me that he had just heard that I had joined Huawei after noticing me at one of the industry conferences. After some small talk, he cut to the chase. “We have a server with a highly complex Ascend chip architecture, but the customers don’t think it’s fast enough, and they want us to optimize it in four weeks, and multiply the algorithmic speed. I heard from my director you guys are also working on this. Can you help out?”

“Sure, let me have a try.”

Being a new employee, I had no idea whether I could make it. But I still wanted to take the challenge. In my perspective, it was great for me to understand the user experience of Ascend. And I thought, “What if my plan works?”

Hanging up the phone, I picked up my spirits. I kept

studying the Ascend kit, working the clues in this trove of treasure as much as possible. I had a small single-chip development kit on my desk, and I decided to start from it.

A few hours later, I was able to compile and run the model. However, after analysis, I found that there were tens of thousands of computing layers and the compiler could not even describe the computation process properly.

“How can we speed it up?” In bed I lay wide awake, staring at the ceiling and sorting out my thoughts.

The next day, my supervisor introduced to me a colleague, Lorenz, who was an expert in image and video processing and had a lot of experience with AI-based algorithms. Maybe he could help!

Lorenz got inspired after hearing my description. “Let’s go for it!” Like a passenger sitting in my backseat, he expected me to unscrew the accelerator, rushing off into the unexplored world.

Together we were more efficient. Soon we found a key issue. In current algorithms, each memory access was treated as a separate computing layer; this was inefficient because treating each memory read as a separate computing process slowed down the overall speed.

Lorenz recommended a paper he had read on video restoration techniques. After rereading it we found that we could combine a lot of memory reads and computations, synchronizing operations and computations to increase the operating speed.

Unfortunately, some tweaking only resulted in a slight increase in speed; there were still a lot of random data accesses that caused errors from time to time. They were like a fog before dawn, silently enveloping the whole

forest, and again we found ourselves in the dark.

“Don’t worry. Let’s make an initial version first, and then keep correcting errors and gradually find out these random data,” said my supervisor. He and several colleagues enthusiastically gathered around.

Lorenz and I sat side by side in front of the screen, discussing and studying the code line by line. Even if there was no way to avoid those random data accesses, at least we had figured out the details of the algorithm, addressed the bugs a bit, and made sure that the code was bug-free and ran first – we were not far from success.

A few days later, the initial version came out, and we finished multiplying the algorithmic speed on a single chip. “If we distribute the computational workload to more chips, then the overall computing speed would certainly far exceed the target speed. Meng will be excited to hear this!” I thought joyfully.

After hearing my good news, Meng simply replied, “Good for you! However, the business requirements were updated, and we have to double the original target speed again ...”

“What?” I was shocked, “Double it again?! How is this possible?”

“We were only recently told the original target speed wasn’t quite enough,” Meng said, “I see you’ve been quite successful with small development kits for individual chips, which suggests the direction’s right.”

Meng continued, “I know the new target is indeed challenging, but don’t you like drag racing adventures? Would you dare to break into it one more time?”

His words stirred my competitive spirit and I nodded, “Sure, why not?”

Some time after I got down to business, I complained to Meng about a few packages I had bought online in the previous week. In Switzerland, there is sometimes a wait of more than a week for delivery items purchased online. Sometimes it is not even known where they have been sent, and the delivery company says that it has been signed for.

“We basically enjoy next-day delivery here in Jiangsu, Zhejiang and Shanghai. Hey! Why don’t you come to China? It’s guaranteed to be fast and accurate!” Meng quipped.

“So fast!” I was very puzzled, for China is supposedly much bigger than Switzerland. How can the delivery there be faster than in Switzerland?

“Maybe it’s the algorithm. Big data makes predictions based on user preferences. The most searched for and popular items are first stocked to the warehouse closer to the community, so that after you place an order the express delivery takes shorter time. Sometimes the purchased item can arrive the same day. They don’t worry about sending the wrong item as they can quickly replace it with the right one,” Meng patiently explained the logic behind it.

“That’s interesting. I want to visit China someday.” After finishing my conversation with Meng, I was back to work.

Staring at the video file playing on the screen, I suddenly had a flash of light in my mind: Isn’t it exactly what Meng was talking about – the logic behind China’s fast online shopping delivery? Why don’t we collect the most important, “hottest” data in advance, “hoarding” them to the buffer, and this will be able to help speed up the chip!

I excitedly shared the idea with Lorenz, who, pondering for a moment, asked, “What if there’s data loss?”

“Those lost ‘packages’ are just like data accessed directly from external memory. We’ll try to ‘retrieve’ them!” I became more confident in continuing in this direction.

The results are out – the algorithmic speed of the individual chips has been doubled again! This is far higher than the incumbent products in market. After we distributed the computational workload to all the individual chips, the computational speed far exceeded the updated target! We did it!

When the final version was released and presented, the customer was very happy. The product team sent us a commendation for helping them solve the problem in a short time. I had a nice celebration with Lorenz for the success in our first collaboration.

This was the first project I completed that had a real impact on a product after transitioning from academia to industry. Besides excitement, I felt a sense of accomplishment.

“It was a great experience collaborating with you and I look forward to the next adventure with you!” Meng exclaimed with joy.

I laughed and replied, “Next time it’ll be even better!”

A “Rollercoaster” Ride

In April 2022, my supervisor suggested that I go to China on a business trip and participate in a program in Sanyapo to tackle some key problems.

He explained that a number of scientists and experts from all over the world were working there on a series of projects to solve technical problems. I was immediately



On Huawei campus in Dongguan, China



Author (first from right) with colleagues

excited, feeling that it must be a great honor to join them, even though the task ahead of me was surely very tough. So, after a long trip I found myself in China.

I was reveling in the beauty of the Sanyapo campus of Huawei in Dongguan, China, when I was dragged into a meeting with the product team, who urgently needed me to work on a difficult chip design project.

“We plan to design a multi-core chip that cuts the memory bandwidth in half while keeping the image processing performance intact and reducing the cost,” said the product representative. His description of the problem made me feel that the task was very tough.

I tried to recall the relevant technical papers I had read, and a paper on image processing technology came to my mind. When I reread this paper online, I was clearer about the task.

Although this paper only researched a simple case of image processing with a single core processor and did not provide a specific solution about multi-core chips in image processing, it indeed showed me some direction of breakthrough. In the next few days, we kept trying to achieve the breakthrough. However, after a few rounds of experimentation, the speed of my model was unsatisfactorily too slow. What shall I do?

One day, while having coffee with a teammate, I was informed that a colleague in Huawei’s European Research Institute (ERI) had worked out a faster multi-core parallel computing method, which was more than twice as fast as the traditional method. Maybe we should try it out.

Excitedly and immediately I ran the simulator for this method, trying to figure out the quickest solution. But I realized that the data for the new algorithm was taking up too much memory and the local memory turned out to be too small to hold it – another tricky problem!

I showed the results of my failure to Liu, the lead architect and reviewer of the project, and asked him for advice. Liu scrutinized every step I had taken, including the details of my failure. After thinking for some time, he smiled, “You’ve been studying how to improve the software algorithm, but neglected the hardware aspect. Can you try changing the hardware’s arithmetic unit? Look, the data of the new algorithm takes up too much memory. Maybe you should consider optimizing the hardware architecture.”

The hardware architecture? This comment from Liu woke me up! Since we are designing a new AI chip, the

hardware architecture can be optimized while improving the software!

We continued to experiment, and were later surprised to find that the goal of storing more data could be achieved simply by adding communication links between the cores. The result was obvious: By adding a small and inexpensive interconnect to the new chip, its processing speeds have increased exponentially and outperformed the more expensive chips currently in use!

Just like that, a new AI chip was born that worked efficiently and faster with half the memory bandwidth! For this success I was also invited to give a presentation at a Strategy and Technology Workshop (STW) to share our results, for which I was honored with the HiSilicon Star Award.

It was a rollercoaster ride filled with ups and downs, setbacks and errors; there my teammates were always willing to trust my judgement, accompany me in the adventure and explore different possibilities in our endeavor to accomplish something in line with the mission of the Von Neumann Laboratory: “to optimize the computing system at all levels, so that the performance is not only increased by a few percentage points, but also a big leap, and to be the leader of technological breakthroughs.”

The Future Is Bright: Racing to the Next Mountaintop

This is my fourth year with Huawei. From my initial aspiration to my present focus and study, I have not only learnt a lot of knowledge I was not exposed to in academia, but also made friends with a group of like-minded colleagues. They are like passengers on the back of my motorbike seat, accompanying me to ride over mountains and through mud puddles; together we dare to go where no one has gone before, and this togetherness is what drives us to go on exploring.

Remember the question during my interview five years ago, “How to automatically optimize digital circuits for energy efficiency”? Today, that question has been answered. We have set up a project team to make the automatic optimization happen. This, with other amazing things, leads me to have great expectations for my future at Huawei.

Taking advantage of a sunny weekend, I patted my old mate Kawasaki and washed it. It was shining in the sunlight. I put on my helmet and rode out into the distance towards the next mountaintop.

A new journey of discovery was beginning!



Author (fifth from right at front row) with colleagues in Shenzhen

A Journey to Excellence

By Joy Ayara / Nigeria



It all began one day with a message left me by an acquaintance of mine, which read: “Huawei is recruiting solutions managers...”

These were the five words that would set me on a journey with Huawei, which started on the 28th of September 2022. That day, right after reading the message, my interest was piqued when I discovered that Huawei was a major leading telecommunications firm.

For reconfirmation I reached out to some other acquaintances who worked in the Human Resources (HR) field to gather some more facts on Huawei and got some feedback on the culture of Huawei which, as I was told, was embodied in Huawei’s corporate core values. Some key words of the values that stood out to me are: customer centricity and inspired dedication.

After some interviews that I passed, I got a job offer for the position I had applied for. I took it, of course. I was given the responsibility of an information technology (IT) solutions manager supporting the Carrier Network Business Group (CNBG).

Getting Started

As is usually the case with all new recruits, I started at the company by undergoing a probation period, which opened me up to the business organization of Huawei and the world of information technology and

communications (ICT), pretty much in the same way that a university introduces its fresh students to the world of learning. This was a shock at first for me but it soon made me realize that Huawei was not just committed to customers but also very invested in making sure that its



My first day at my workstation in the Huawei Nigeria Representative Office

staff would excel by bringing out the very best in each and every one of them.

I went beyond just studying my products and solutions; I would spend time trying to understand other products in Huawei CNBG. The New Employee Orientation (NEO) Program then kicked off and this gave me a classroom feel, enabling me to learn more about Huawei and its business. There I also got to meet and know my colleagues and understand the company's organizational structure – how its departments interrelate to function properly. One thing that was extraordinary about Huawei, as I soon noticed, was the collaborative atmosphere that was evident in every project. The key takeaway from this NEO class is that, at Huawei, one does not work alone as an individual and one must be a team player – work is usually carried out by and between several departments and most of the time the people are across different time zones.

The Eaglet in the Big Sky

It is known that for an eaglet to learn how to fly, the mother eagle takes the eaglet to a high level in the sky

and releases the birdie for it to start to learn how to fly. Upon its release, the eaglet starts flapping its wings until it understands how to soar in the sky. From the very first project I joined in at Huawei, I got a similar experience to that of the eaglet learning to fly. This project involved a breakthrough product line of ours that was making entrance into the carrier market in Nigeria.

As an IT solutions manager I was supposed to engage with customer T, one of the telecom carriers in Nigeria, to introduce one of our solutions which would help increase the efficiency of their data backup, recovery and retention. Our solution was based on the OceanProtect X9000, equipment which was still new to our Nigerian carrier customers. I saw this as a challenging but exhilarating task and felt like an eaglet flying at a very high altitude in the sky for the first time. How wonderful it would be, I thought, if customer T became the first carrier to use our equipment in their datacenters in Nigeria!

On that fateful day, I arrived at the customer's premises to have a brief meeting with their IT infrastructure planning team who were the first point of contact for me to go through. They were responsible for all products or projects to be implemented at any one of customer T's datacenters. After hearing my presentation,



With my teammates at dinner (author is third from left)

a senior manager from the customer's planning team gave me a doubtful look and asked me directly: "Why should we consider the OceanProtect X9000 when it's still new in Nigeria? And why is it necessary when we currently have few data backup scenarios at our datacenters?"

The question made me take a deep thoughtful breath before I could give my answer. "Technology never stops," I said to them then. "We are committed to providing our customers with new technologies that help them become more and more efficient!"

"OceanProtect X9000 means a great opportunity for you to spot some backup issues in your datacenter that you might not have realized yet ..."

Believe it or not, my words roused interest amongst the customer team and they agreed to move on with the proof of concept (POC) for the data backup solution we recommended.

Delighted with the success in my first step, I started to learn about customer T's infrastructure and how it functioned. I would meet with their technical team in the backup area and humbly ask for their input and insight regarding what I should do to better present

Huawei's solution. Over time I tried to comprehend the technical requirements from the customer. I also communicated with our backup solution experts at the headquarters (HQ), particularly the research and development (R&D) team, while I would provide the experts with precise specifics to assist in the creation of a solution that might be generic but could also be tailored specifically for customer T.

Gradually I had gained trust from customer T's technical team by letting them know that I was here to help solve their problems and that I did not mention or involve Huawei equipment intentionally. During a meeting, their team leader (TL) told me how they had spent a lot of time running the backup when they encountered a serious bottleneck with a backup file. I saw a chance in this and I seized it to explain that the tiring long backup time could have been greatly shortened if our backup solution had been used.

To help the TL and his team understand the features of our backup solution, I arranged many in-person and virtual workshops for them to meet and communicate with our experts. I would encourage them to ask



With our regional executive and LTE classmates (author is third from left at front row)

questions freely during these sessions, which helped them gain a better grasp of the technical workings of our solution. With every workshop, the customer's team learned more about the solution and started to see the potential benefits from it.

In the end, customer T decided to use their operational production environment as a testing ground. Although this was no easy task, we were enthusiastically prepared to demonstrate our strength. In the course of the backup test, we managed to execute a backup with our solution at their datacenter in just seven hours, which was a dramatic improvement, given that it had usually taken them 56 hours to complete the same backup with their existing equipment. The outcome not only surprised the customer's team in a pleasant way, but also interested them enough to take a closer look at our solution and reconsider their datacenter's operations.

Eventually, we succeeded in the POC and customer T added the expenditure on our product to their budget. The TL of customer T's technical team confirmed that the OceanProtect was a unique backup solution that would make a whole difference to their datacenter. Convinced by

the good results brought by our solution, the TL had soon become a big fan of Huawei's data backup technologies. Now, whenever there is an opening to bring in our solution, he never hesitates to reach out to me and make a request for Huawei's latest technologies to support their backup operations.

The first project that I was involved in, I finished it in a record time of only five weeks and this was quite a feat for a green hand like me. At the start of 2023, I was selected as one of the top-performing employees to participate in the Local Talent Elite (LTE) training soon to take place in South Africa. The training kicked off in February and we had a class of 23 professionals from across the Southern African region. For us to have an in-depth understanding of Huawei, it focused on walking us through the company's business model, corporate culture and project processes which are needed to deliver a successful project from start to finish.

Capturing Customers' Attention: A 10-minute Task

The Huawei Carrier Congress was held in 2023. I participated as a speaker and won the Excellent Speaker award. At this event, also known as the Mini-Mobile World Congress (MWC) and taking place at the Huawei Nigeria Representative Office in Lagos, we showcased several solutions to our customers.

The congress' objective was to demonstrate new solutions ready to be launched in the Nigerian telecommunications market. Therefore, I had a very clear job responsibility: to pique the curiosity of our audience in ten minutes.

"Get ready! Make use of your ten minutes and win!" a voice in my head whispered, as the customer representatives started to swarm in and fill in the hall, ready to listen to my presentation. I had a plan in mind. I must hit the catch points that would translate my words into savings on operational expenditure (OPEX) and bringing in profit, which was their concern in every business domain, I thought to myself. Oh, here they came and I found myself facing an audience.

"Hello everyone, thank you for joining us!" I began my passionate speech. "What comes to your mind when you think of the word 'green'?"



Winning the Excellent Speaker award



At the CEO dinner (author is on the left)

“Global warming!” A customer’s representative spoke up from the middle of the gathering crowd. He was a general manager of storage and server management.

“Thank you, sir! You’ve made my job here much easier.” I responded with a smile, “In essence, our new solution as a whole is about saving your money and decreasing the impact of global warming or climate change. How does it make this happen? Well, by minimizing your power consumption ...” I noticed that many listeners were nodding their heads – obviously I had succeeded in drawing their attention to “saving money”!

For me, that was a successful 10-minute presentation. Many of the companies present at the congress requested additional follow-up workshops, which soon translated to business and customer engagement opportunities for me. They were interested in our solution, without a doubt. In the end we delivered the solution to one of the attending customers after several workshops and alignment meetings. In retrospect, I realize that it all started with a productive 10-minute talk. It did, quite literally.

“ *My Huawei story is one of continuous learning, reflection, and growth. It is also about attaining greater heights for myself...* ”

Attention! At Ease!

We Huawei people should adhere to our corporate core values. As the most important value of them all, customer centricity is the road to winning our customers’ loyalty and trust through our technology, solutions, and, in particular, commitment to them.

I won the Regional Excellent New Employee award, an honor in recognition of the diligence, perseverance and customer centricity that I had shown in my service with the organization. Looking ahead, I am hoping to continue working with my team to overcome the challenges that may lie ahead and to reach new heights in a digital, intelligent, and fully connected world.

My Huawei story is one of continuous learning, reflection, and growth. It is also about attaining greater heights for myself, my team, and the company despite the woes and adversities we have faced. I would like to encourage you all, dear colleagues, to apply yourselves to your fields and to stay committed to making the world fully connected and intelligent by bringing digitalization to every person, home, and organization!

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Navigating Challenges Through Trust and Collaboration

By Ashraf Esmat Khalil / United Arab Emirates (UAE)



Seizing Opportunities: Preparing for Abu Dhabi Workshop

In early 2022, I was promoted to Senior Solution Architect, a position responsible for cyber security cloud solutions across the Middle East and Central Asia region. I was eager to seize an opportunity to make greater contributions to the organization and to deliver the greatest value to our customers with my expertise.

In July that year, there came my first such opportunity. I received a message from my direct manager regarding a request from customer X in country Y; the customer demanded workshops to delve into Huawei's cloud cyber security capabilities, an area in which I had been told I excelled. I was absolutely thrilled to have this opportunity. Even though I was spending time with my extended family in Egypt at that time, I could not wait to check the request and immediately went through 200 slides to grasp the context and mentally prepare myself.

Workshops were then planned just after the Eid break in Abu Dhabi, the United Arab Emirates (UAE) and there were only three days left. And I came to know that the technical reviewers from customer X was a group of talented experts from diverse backgrounds and with extensive experience. One of them, Mr. Ali (pseudonym), was well equipped with business and managerial skills while he held the highest technical certifications in the field. It was essential for us to have his approval of the

technical proposal for this project. Although I had not met Mr. Ali in person yet, I was aware of his reputation in the industry. I felt pleased to cooperate with these high-caliber, high-profile talents, though at the same time it stressed me out.

I flew back to Abu Dhabi a bit earlier to get well-prepared, in terms of energy and readiness, for the upcoming workshop. On day one of the workshop, we warmly received the group of talented experts, including Mr. Ali. They showed great interest in our solutions and





A photo with my teammate after the workshop (author is on the left)

kept asking questions; as I noticed, they were validating our solutions to see if the solutions could meet their business, functional and non-functional requirements. To address their concerns, I was diving deep into the solutions during the presentation I was making to them. Suddenly, my presentation was interrupted by an unexpected question from Mr. Ali. “Mr. Khalil,” he asked, “could you show us how the micro-segmentation works and what are file-level backup features?”

At that moment, everyone was looking at me and I got a bit overwhelmed. However, I reassured myself that I would do fine since I had been well prepared. So, I replied confidently, “Good question, Mr. Ali. Let me show you the best practices for micro-segmentation and tell you what the file-level backup features are.”

Considering the technical difficulties involved, I leveraged a few demos and a proof of concept (POC) to ensure an easier understanding. Afterwards, Mr. Ali and the technical reviewers from the customer started to whisper to each other and then smiled, obviously showing their appreciation.

The three-day workshop turned out to be a great success, filled with exhilarating engagements and interactions as well as fruitful discussions. On the last day, Mr. Ali came to me and said happily, “Ashraf, you are welcomed to visit city B for further cooperation discussions.”

“Great! I’d love to. Thank you for the invitation,” I said.

Forging Partnerships: Collaboration in City B

One day in August 2022, my dream of visiting city B of country Y came true. As soon as I landed in the city that day, as I still remember, I immediately met all my teammates in the local Huawei office. Due to the essential importance of this project, we formed a team with members coming from different backgrounds but having a wealth of knowledge and expertise previously acquired from many successful projects in various industries. Even though we had not met before, their voices and tones gave me the impression of kindness and warmth. This was the first time that we had ever met each other, but I never felt so close to them.

After warm greetings with each other, we initiated our first face-to-face meeting right away, where we aligned our goals and actions. We had the headquarters (HQ) team joining us online, who, during the meeting, provided valuable insights and recommendations based on their profound knowledge and experience. I felt grateful to have such strong support from our HQ.

After a hectic day of work, our team decided to unwind by exploring the city’s culinary delights. One of our teammates took us to a hidden eatery. While we were sitting around a bonfire, we started to talk about our careers and lives at Huawei and exchanged some experience we had obtained from previous projects,

especially in how to engage customers, how to present value, how to break through all barriers, and so on. Some of them had been working at Huawei for quite a long time while others were newcomers. Each of us had his or her unique experience: there was success and there was failure. But there were some common points I could pick up from all, and the commonalities included courage, self-motivation and professionalism. A few moments later, the atmosphere was filled with our laughter and smile; everything felt warm in the light of bonfire, and the flames were getting higher and higher. While in the office, we were working together as colleagues, now we were chatting and laughing as family. Listening to my colleagues sharing their experiences in new markets would never be boring to me, but inspiring to me instead.

In the next few days, the team and I had to work harder as we were all determined to seal the deal as it was not an option to lose it. We were dedicated to preparing the materials and customizing the workshops to collect information on the customer's concerns and needs. Moreover, we were united as one to forge a stronger cooperative relationship by effectively supporting our customer in identifying the gaps in technology and sharing more knowledge and expertise with our customer in the workshops. All our efforts were appreciated by



With my colleague in China (author is on the right)

the customer's management team. With everything well settled, I flew back to Abu Dhabi to work further on the solution design and submit the final proposal before the given deadline.

In retrospect, I find that it was two weeks full of joy and excitement for my colleagues and me. We got to immerse ourselves in the local culture and cuisine by turning our dinners into a nightly adventure. These dinners not only treated us with local delicacies but also strengthened our bond, creating fond memories that would last long after the project was complete.

Rising to the Challenge: Our Triumph

Continually, we had clarification meetings with the customer's team remotely to finalize the solution design. After weeks of back-and-forth with them, still there was no solid recognition from their technical reviewers of the solution design we presented. We kept modifying the design over and over. Deeply I knew that there was something missing in the design, but there were too many technical details and I could not figure them all out to focus on. At that time, I felt depressed and worried that we might lose the project. Due to the importance of this project, though, I told myself to hold on till the end. I had to know what our customer exactly needed as soon as possible so that we could amend and improve our design proposals to meet all their needs and requirements before the final design version was submitted. Therefore, considering the critical situation, I decided to fly back to city B again.

Upon arrival, I paid a visit to our customer's office to meet Mr. Ali. When I stepped into his office, I did not see Mr. Ali there and was then informed that he was in the middle of a meeting. So, I sat down outside and opened my laptop to work. I fully devoted myself to our design solutions and did not even notice when Mr. Ali was approaching.

"Hi Ashraf! When we were on the phone yesterday, you were still in Abu Dhabi. But now you are here already. How efficient you are!" Mr. Ali said to me with a surprised but happy look.

I quickly stood up and greeted him. Then we started to talk over my prepared materials, exchanging ideas with each other – a conversation that was informative and enlightening to me. Mr. Ali told me that he appreciated our



A demonstration given by the author at the Gulf Information Technology Exhibition (GITEX)

professionalism and commitment to this project. He also gave me some constructive and helpful advice.

At the time our team's objective was to assess the overall situation correctly and accurately and provide a strategic demonstration of our strength in more detail. We managed to further amend the contents regarding the current market landscape in reference to Mr. Ali's advice, providing in-depth analysis of the industry and presenting our solution with the highest standards. In the end, a few days prior to the deadline, the proposals were completed, which were more comprehensive and competitive from all perspectives.


To further solidify our position, we invited the customer's executive management team to attend the Gulf Information Technology Exhibition (GITEX) in UAE, which they accepted with pleasure. During the event, I seized the opportunity to demonstrate Huawei Cloud's portfolio to the customer's senior executives. Seeing their interest in and recognition of our products and services made me feel so proud. Meanwhile, it seemed that we were one more step closer to final success.

One day while I was sitting in the office working on some documents, I received a call from Mr. Ali. I was thrilled by what he said on the phone: "Based on your team's analysis report, we decided to move forward with Huawei! ..."

To further demonstrate our technical and business strengths, we invited the customer's team to visit our HQ in China. Sitting with our research and development (R&D) team, we worked closely to test and validate the solution at all of its aspects. The visit resulted in favorable outcomes and benefits exceeding expectations, and it created a great environment to conduct more technical workshops and awareness sessions covering more solutions and portfolios in the future!

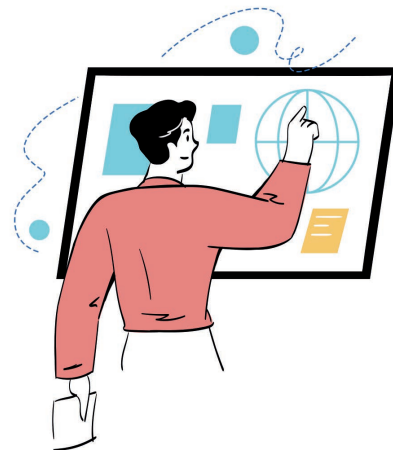
"Well done! We need to immediately start the cloud implementation since this project is considered a solid foundation of the digital transformation for our country," Mr. Ali said to me with joy at the end of the visit.

The final success of our engagement with the customer was marked by the signing of the contract. This achievement is a testament to the hard work and dedication of our team. The success underscores our unwavering commitment to excellence and our ability and willingness to meet and exceed customer expectations.

We are excited that we are on this journey together with our customer, confident that our innovative solutions and collaborative approach will lead to significant value and success. I want to say "thank you" to everyone for their exceptional contributions that have made this achievement possible. 

Embracing New Horizons: Transitioning to a New Role

By Titinant Trongjaroenchai / Thailand



Early on in my career, I had first worked as an electrical engineer and an energy consultant, roles where I got to hone my skills. After that, I had worked on sustainable buildings, exploring innovative green building solutions, devising strategies for carbon emission reduction, and championing the advancement of clean energy technologies. Until the electrifying day just before I became part of a Huawei team. That day, I was beyond excited to know that I was about to embark on a new journey with Huawei, a force to be reckoned with when it comes to technological innovation. Where else, I thought to myself, could be a

more perfect place to utilize the vast possibilities of solar energy than in Thailand, a country blessed with constant sunshine, where the endless blue skies offer endless opportunities for solar power? With adrenaline pumping through my veins, I was eager to step into the world of Huawei, ready to begin a journey that would change how I understood sustainable energy and lead me to new discoveries and advancements.

Joining the company represents not only a career milestone but also a great honor. And I knew that this was too good an opportunity to be missed for me to contribute to a company at the forefront of innovation in sustainable energy solutions.



During the upcountry workshop in Thailand

Navigating Technical After-Sales Challenges with Optimism

Stepping into the role of technical service manager filled me with immense delight, especially considering our tight-knit team of just five individual members. Despite the initial challenges posed by our small size, we moved strongly forward, making every possible effort to optimize our structure and cater to the diverse demands of customers in the market.

A great part of our work was to help customers navigate the intricacies of solar system service. It could end up being a tough task often fraught with challenges and complexities. The complexities of diagnosing and

resolving the issues would require specialized knowledge and expertise, leaving customers feeling vulnerable and uncertain about the security of their investments, let alone the return. Balancing customer requests and partner collaborations proved to be a bit of a juggling act, but we approached each challenge with a customer-centric mindset, determined not to let anyone down. To keep pace with the dynamic landscape, I turned to various resources – from online learning platforms to insightful books and the invaluable guidance that my colleagues were so generous to offer. I was pleasantly surprised to find Huawei's plethora of human and other resources and especially its organized approach, which served as valuable guidelines for us to navigate the difficulties in our daily operations.

Of our routines, one stands out vividly in my memory – it was a routine task where a seemingly ordinary incident at a customer's site turned into a unique challenge. Despite the fact that I initially processed it with my partner as per the standard procedures, it soon became evident that this case was anything but typical. Collaborating closely with our specialist team, we searched and researched in depth to identify the root cause, until we ultimately traced it back to an environmental factor. Through unwavering cooperation, we worked tirelessly to address the issue; we made it at last, well exceeding our customer's expectations.

Our approach proved to be highly effective, which was substantially evidenced by the gratitude and continued support from our valued customers. We were soon able to determine that the root cause had not originated from our end, but we remained steadfast in our dedication to supporting our customers every step of the way. In retrospect, I realize that it is moments like these that reaffirm the importance of our role in ensuring customer satisfaction and fostering lasting partnerships.

Navigating Opportunities and Challenges in Business Development Among Rapid Industry Growth

Transitioning from my role as a technical service manager to that of a business development manager has been a thrilling journey filled with new opportunities and challenges. As we established a digital power department

with a team of nearly fifteen members, I found myself entrusted with the responsibility of nurturing and growing several key accounts in this burgeoning market of digital power.

Undoubtedly, this task presented its fair share of challenges, particularly as we navigated the different ways in which sales were conducted in the digital power sector. That was a time when the solar market in Thailand was undergoing rapid expansion, driven by various factors including market trends, government campaigns, and fluctuating raw material prices. With a multitude of investors, developers, and engineering procurement construction (EPC) companies entering the fray, alongside numerous overseas vendors establishing a presence in Thailand, the competitive landscape was more intense than ever.

Moreover, the opportunities in the electric vehicle (EV) charger business extended beyond hardware deployment to include software solutions and value-added services. Looking ahead, we found that the EV charger business was poised for continued growth and innovation especially in Thailand. As the adoption of EVs continued to soar and technology kept advancing, opportunities abounded for businesses to capitalize on this market for multi-fold growth during the past two years. We concluded that, by staying abreast of industry trends, forging strategic partnerships, and embracing innovation, we would see our EV charger business play a pivotal role in shaping the future of sustainable transportation.

In the middle of these challenges, I found inspiration from the opportunity to spearhead a groundbreaking home developer project, leveraging the innovative solutions offered by Huawei technologies. From conceptualization to execution, my team and I managed to provide comprehensive solutions that catered to the needs of our customers. To pull off this feat we adopted a multifaceted approach, one that encompassed technical expertise, commercial acumen, strategic marketing, and the fostering of strong relationships with stakeholders at all levels.

By joining forces with leading developers, we aimed to redefine the standards of eco-friendly living by incorporating cutting-edge technologies into residential spaces. Through the seamless integration of solar panels, energy storage systems, and smart chargers,



During a presentation to customers

we envisioned homes that are not only energy-efficient but also capable of generating, storing, and managing renewable energy autonomously.

Our partnership extended beyond the realm of real estate development to encompass broader initiatives aimed at creating a zero-carbon society in Thailand. We were collaborating closely with electricity utilities and regulators to advocate for policies and regulations that support the widespread adoption of renewable energy technologies. Together, we were championing initiatives to accelerate the transition towards clean energy and to mitigate the environmental impact of conventional energy sources.

Despite the considerable time and effort invested, witnessing the tangible progress as our customers embraced our solutions filled me with a sense of accomplishment. As we were having discussions for the next phase of the project, I was reminded of the importance of perseverance and determination in the face of adversity. Each step forward, no matter how small, brought us closer to achieving our goals and laid the foundation for future success.

Looking back on this, I find it to be a good learning experience. While the path ahead may be challenging, I am confident that with a dedication and a positive mindset, we can overcome any obstacles and emerge victorious in our endeavors. And I realize that, as long as we press forward staying positive, our efforts today will pave the way for a brighter tomorrow.

Enhancing Business Partner Development for Sustainable Growth in Huawei's Digital Power Business

After devoting two years to the roles as previously mentioned, I was entrusted with a new responsibility: overseeing channel development as part of Huawei's digital power business model. This shift toward a new role allowed me to identify certain deficiencies in our distribution channels, coupled with ongoing difficulties and challenges. Recognizing the critical importance of nurturing our business partners as a way to address such deficiencies, I made it my personal mission to enhance their capabilities in selling Huawei products by realizing and making use of their unique advantages.

Navigating the challenges of partner development proved to be a complex undertaking, with several channel partners each possessing distinct channels and customer targets. For instance, partner A, who excelled in the retail business, leveraged their expertise to navigate the physical marketplace with finesse and skill. On the other hand, partner B boasted a deep understanding of e-commerce, harnessing their specialized knowledge to thrive in the digital landscape. Each partner brought their unique strengths and insights to the table, catering to different market sectors and capitalizing on their individual areas of expertise. Overcoming these disparities required patience and a concerted effort to gradually improve each

partner's performance. One of the key takeaways and insights gained from this experience was the necessity of maintaining a sense of partnership, wherein our partners felt their significance and importance to Huawei's team and were empowered to advocate for our products with confidence.

Over the past year, we have remained dedicated and committed to providing comprehensive support for our partners, offering them valuable materials and training to enhance their skills and knowledge. This consistent investment in our ecosystem partners reflects our unwavering dedication to their success and emphasizes the importance of collaboration in achieving our shared goals.

Moreover, we recognize that our value proposition extends beyond sales; it encompasses presales consultation, after-sales service and marketing support, aimed at providing added benefits to our customers. By integrating our partners into this ecosystem, we can deliver a more comprehensive and impactful experience to our customers while simultaneously strengthening Huawei's position for long-term development.

In conclusion, as we continue to navigate the complexities of partner development, let us remain determined and committed to collaboration and innovation. Together with our partners, we have the power not only to meet but also to exceed the expectations of our end customers, all while laying the groundwork for a sustainable and prosperous future.

Fostering Excellence: Navigating the Journey of Growth and Collaboration in the Solar Industry

Looking back on our journey in the renewable solar energy market, it is evident that each step has been a building block in our growth and success. From the early days to the present moment, we have gained collective experience that have helped us to grow into an industry leader, and equipped us with invaluable insights and skills that set us apart in the market.

Throughout this odyssey, our team and I have played a pivotal role, providing support, guidance, and encouragement every step of the way. Within this nurturing environment, we have fostered a culture of knowledge sharing, where case studies and strategies for success are freely exchanged. This collaborative spirit has been instrumental in our being able to innovate, adapt, and thrive in a rapidly evolving industry landscape.

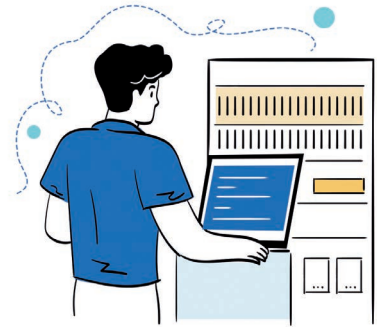
Moving forward, we will remain committed to collaboration, innovation, and customer satisfaction. Together with our customers and partners, we have the power to shape a brighter future for Huawei and all those we serve, and we will continue to navigate the complexities of the renewable solar energy market with passion, determination, and a shared vision for success in the form of a greener, better world. ②



With my colleagues (author is fourth from left)

From Challenges to Success: My Huawei Odyssey

By Alberto Olguin / Mexico



It was at Huawei that I landed my first professional job after graduating from college. One day in October 2019 I joined Huawei Mexico as an intern, marking the beginning of my journey with the company. For the four months that followed, I worked hard on the technologies, and the effort paid off. I became a wireless customer support engineer in April 2020. My daily job was to assist customers in addressing issues and problems with their routine operations.

First Steps: Huge Challenges Facing Me During the Pandemic

Then there came the pandemic, and suddenly people all over the world had to stay at their homes. With customer offices and premises inaccessible, the main challenge was to ensure the stability of telecom networks. This was crucial because, when nearly all people had to work from home and stay online most of the time, Internet traffic and online activities had significantly increased.

One of the most challenging months during the pandemic, as I recall, was when I was providing support for a wireless network upgrade project for customer X. I was just a green hand and the upgrade project was the first of its kind that I had ever handled by myself. And you can imagine the immense pressure that I was under

when I tried to deliver this task in my rookie days.

Despite all this I knew that I had to stop being doubtful. Quickly I got down to business. The first order of business involved learning the process of the upgrade and understanding the requirements – not only the technical aspects but also the customer's processes.



During my first month at Huawei

The other challenge for me was the stringent deadline. Around 50 base station controllers (BSCs) and 11,000 sites had to be upgraded within two months. I realized that, to meet this tight deadline, I could not afford to lose time. Immediately I began searching and asking for support and help from my experienced colleagues, who were, fortunately for me, ready to help me out by providing me with many useful tips and suggestions. I must confess that, in the beginning, everything felt different: Some tasks that were typically done during the day had to be organized and completed at night, along with the upgrade activities. I must stay active during these activities until the customer team validated each activity as successful.

With growing confidence, I continued working hard during those two months. Finally, all my hard work paid off. With the support of my teammates, I successfully implemented the first 100% remote software upgrade at the 11,000 wireless sites. This achievement was met with positive feedback from the customer.

Through those efforts and others, I significantly enhanced my technical and communication skills. Originally a newly graduated individual who was once afraid to speak with people, I grew into a confident engineer capable of solving problems and communicating effectively with anyone.

My Most Challenging Customer Experience

Then came 2023, a new year and I returned to the office after almost three years of working from home.

One of the most significant events occurred at the beginning of this year in my journey as a wireless customer support engineer. It was an interference issue reported by customer X at their long term evolution (LTE) sites. The customer began to complain that our radio hardware was defective and causing interference problems without triggering any alarms or issuing any notifications in their network. This gave rise to a massive problem as it required replacing most of the hardware in the customer network and, if it was true that our hardware had been responsible for the interference, it would pose the risk of damaging our reputation.

This was something new for me. In the beginning, I



With my teammates (author is on the far right)

thought to myself, “How was it possible? Is our customer exaggerating?” But as the problems kept being reported by more people from the customer’s side, including some senior executives, I realized that I was encountering one of the most serious issues, a new challenge that I had to meet head-on.

Before this issue, I had been used to talking only with ordinary employees on the customer side. But now, I had to interact with some high-level executives of the customer for the first time. The tasks involved, as I found, were highly complex and, worse, they were not related to my capabilities and skill set. Because it was the first time I would be making presentations to high-level customer executives, my nervousness that I thought had been overcome for good came back, and became more obvious and frequent at the time. This occasionally caused me to hesitate during my presentations, and people from the customer would say to me from time to time: “It is not clear”, “We need more detailed and clearer answers,” and so on. Despite these tough comments, I knew for sure that giving up was not an option.

During the night, I engaged in self-reflection regarding those presentations. I came to realize that I should prepare and study each concept I did not understand well and, before each new meeting, address and dispel any self-doubts in me, thinking, “I need to be more focused and precise in the presentation.” And I put the ideas into actions. With each passing meeting, I became clearer about each concept than before; and in the end, that allowed me to get more skillful and effective

in communication with them, ensuring that I conveyed information clearly and accurately to avoid confusing or alarming them more than necessary.

After about six months of meetings with the customer and having addressed all their concerns, they requested laboratory tests. And again, I felt nervous, because I had only seen the equipment in Huawei documentation and “interacted” with it remotely. Despite my initial concerns, I was fortunate to have supportive teammates with more experience, who guided me during that time. I seized the opportunity to learn how to use the equipment effectively.

Armed with this newfound knowledge and skill, we conducted laboratory tests to demonstrate that there was no issue with the equipment that we had supplied and installed. These tests validated that all signals from the radio equipment were functioning normally, providing solid evidence to support our case and resolve the issue about the cause of the interference. This achievement not only proved our point but also boosted my confidence.

At last, we went on to replicate the tests in the field with the customer, which turned out to be more difficult due to the need to consider environmental factors such as the nearby trees, cars, and other sites emitting signals. For this part, our customer chose two cities located in the

east of Mexico: Campeche and Veracruz. Both cities were selected and prioritized because the customer had more troubles measuring there.

In Veracruz, the main issue was that the sites to be measured were located in the downtown part of the city. Some measurements were not stable due to external factors. For example, when a bus or a truck was in front of our antenna, some abnormal measurements appeared in the results. In such cases, we had to wait for a few minutes and measure again when there were no large trucks in the way, and to convince our customer that the abnormal signals were not caused by the site’s antenna.

The other city, Campeche, is near the Gulf of Mexico and has a smaller population than Veracruz but it is hotter and more humid. Of course, I was not used to those temperatures since I am from Mexico City, where the climate is milder. So, you can imagine that, when my mentor and I were measuring radios at a site, we looked like ice cream melting so fast. Now, I recall, every time we did the measuring, we would look for shade and a convenience store to buy some cold drinks. Another issue was checking the measurements at certain spots. At one of such spots, for example, the sunlight was so strong that, when we checked the analyzer, we could not see anything until we found a shadow.



During a Mexico delivery and service team building activity in 2023 (author is fifth from right at third row)



Out for field measurements with my wireless mentor (author is on the left holding the antenna)

These tests were beneficial for both the customer and us because, with the dedicated support from and hard work of our entire team as well as the collaboration between the customer and us, we were able to gather evidence proving that the Huawei hardware installed at the sites was functioning properly without any defects. When I heard this “ruling” that vindicated us, I was relieved and happy. All those nights when we had to stay up late, the tough meetings, and all the efforts put into those measurement tests in the field had not been in vain. Indeed, new knowledge was gained, and a formidable challenge had been surmounted – what could be more important and fulfilling than these?

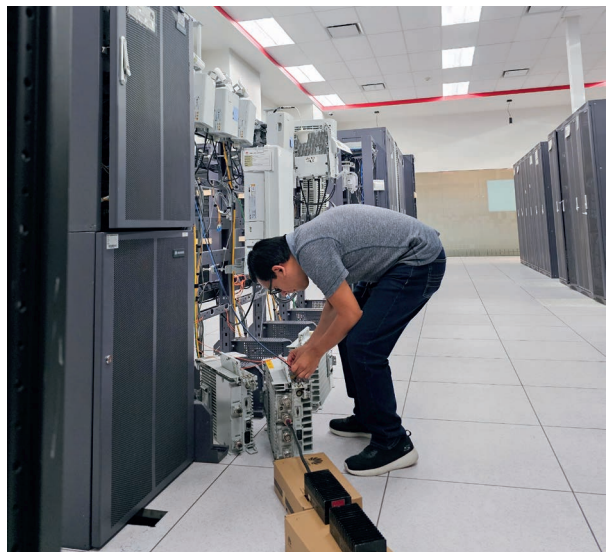
My Way Continues: New Challenges That Lie Ahead

These are some of the achievements I have made with the support and help from my teammates and my mentor and many others, and have been recognized by the department. At the end of 2022, I was honored with the Future Star award. This was an honor in recognition of my efforts in the previous years and the high level of customer satisfaction that I had helped to ensure.

The new challenges I face now involve gaining more experience in the new technologies emerging in Mexico, particularly in the era of 5G. I am also responsible for

training newcomers in these technologies, who are starting their professional careers and learning wireless technologies in the department.

I hope that these stories of mine will inspire new colleagues to be customer-centric and dedicated individuals. Stay positive and open to new things and experiences, for Huawei is a place full of opportunities and challenges at the same time. Remember, the barriers are all in your mind, and your effort and passion will break them down. 



Preparing for a test in the lab



Huawei ICT Competition: Igniting the Spark of Genius Among Global University Students

By ICT Talent Partner Development Dept

On the day when the Huawei ICT Competition 2023–2024 Global Final concluded, Algeria’s participating students were honored with a congratulatory message from President Abdelmadjid Tebboune; in a tweet from his official account, he celebrated the award winners, stating, “I am very proud of our dear students for having won first place worldwide in one of the Information Technology (IT) categories at the ‘Huawei ICT Competition’ organized in Shenzhen (China), and the Grand Prize for information and communication technologies (ICT). Congratulations to Algeria on this new generation of scientists who are paving the way for a prosperous future for our country. My most sincere greetings and thanks to you all.”

In a similar vein, the team from Türkiye achieved remarkable success by winning the Grand Prize in the Innovation Competition. Kaan Başkurt, the Turkish Consul General in Guangzhou, China, attended the

award ceremony and presented the prize to the Turkish team. He bid them, “Congratulations to our students and their esteemed professors! We are proud of our team!”

Adding to the sense of ceremony, Kuwait’s network team students received similar treatment. Following their win, the local telecom provider Ooredoo illuminated the Ooredoo Tower with a spectacular light show, congratulating the Kuwaiti team on securing the third place in the Global Final. They also pledged internship opportunities for one of the team members.

Much praise poured in for the winning teams from Algeria, Türkiye, and Kuwait, with their respective embassies giving a thumbs-up, high-ranking officials welcoming them at airports, and prime ministers meeting them — all showcasing each country’s encouragement and appreciation for ICT talent.

For young ICT students worldwide, this may well be an unforgettable highlight in their lives.

On May 26, 2024, the closing & award ceremony

of the Huawei ICT Competition 2023–2024 Global Final was held in Shenzhen. This 8th edition of the Huawei ICT Competition saw a record number of participants, attracting over 170,000 students from more than 80 countries and regions, representing over 2,000 colleges and universities. After rigorous national and regional rounds, over 470 contestants of 161 teams from 49 countries and regions reached the Global Final, competing for various awards. Notably, 19 teams from 9 countries were awarded grand prizes in both the Practice and Innovation Competitions at this year's Global Final.

Practice Competition: Who Will Win the 8-Hour Hands-on Skill Contest?

The Huawei ICT Competition consists of the Practice Competition and the Innovation Competition, with a three-tier advancement system of National, Regional, and Global Finals. Each team is composed of three students and one instructor. This year's Practice

Competition attracted over 160,000 students from around the world, a 39% increase from the previous year. After the National and Regional Finals, a total of 134 teams from 44 countries and regions advanced to the Global Final.

This year's Practice Competition had four tracks: Network, Cloud, Computing, and Ascend Artificial Intelligence (AI). It examined contestants' theoretical knowledge, hands-on skills, and teamwork abilities in the field of ICT. The Network track assessed knowledge related to data communications, security, and wireless local area network (WLAN). The Cloud track focused on knowledge related to cloud, big data, and AI. The Computing track examined knowledge related to openEuler, openGauss, and Kunpeng application development. The Ascend AI track was newly added and covered knowledge related to four technical domains: AI algorithms and applications, MindSpore practices, full-stack Ascend AI platform, and Ascend AI application practice. The Global Final was an 8-hour practical exam that followed the difficulties of the highest level of Huawei Certifications – Huawei Certified ICT Expert (HCIE).

The 8-hour lab exam not only tested the contestants'



Contestants concentrating in the Practice Competition

practical skills but also stretched their endurance, concentration, and teamwork. Only through repeated training and close collaboration during the preparation phase can they have the hope to achieve something remarkable in the competition.

Through preparation and training, students' knowledge and practical skills have been remarkably improved. The team from the Poznan University of Technology of Poland won the Special Prize in the Network track of this year's practice competition. A team member, Arkadiusz Niedziela, in an interview, expressed: "During the Huawei ICT Competition, I really improved my skills, gained many Huawei certificates, and broadened my knowledge. I think I will keep improving my skills, my knowledge, by doing more Huawei certifications. And I think it will help me find a job in the future."

Innovation Competition: Inspired Ideas, Bolder and More Daring Than Ever

The Innovation Competition aims to cultivate innovative ICT talent, complementing the applied ICT focus of the Practice Competition. This year, the Innovation Competition centered on emerging technologies such as AI, Internet of Things (IoT), big data, HarmonyOS, and Huawei Cloud. Contestants were tasked with addressing real-life needs, integrating industry application scenarios, and using cutting-edge ICT to propose solutions with both societal and commercial value, alongside designing fully functional projects.

This year's Innovation Competition attracted over 2,000 students from 38 countries and regions worldwide. Through intense national and regional competitions, 27 teams from 16 countries and regions were shortlisted for the Global Final, showcasing their projects and competing on a global stage.

The Innovation Competition was conducted through presentations and panel assessments. After each team showcased their projects, assessors evaluated the projects based on five criteria: creativity, system complexity, technical complexity, societal benefits, and functionality. They asked questions, gave professional suggestions, and completed comprehensive assessments.

The GrocPOS team from Pakistan won the Grand Prize in this year's Innovation Competition for their

Visually-Controlled Intelligent Point of Sale (POS) Solution Based on Mobile Applications developed using Huawei Cloud databases, Marketplace, MindSpore, and cloud storage technologies. The solution uses a smartphone camera to quickly and accurately identify groceries, which allows for the scanning of three to four products at once, greatly optimizing the current barcode scanning mode and streamlining the checkout process. The team members expressed their hope to further promote this fast mode and improve the retail industry in Pakistan with an affordable and convenient option for small local stores to modernize their operations.

The Turkish team Edusyntech, which was also a Grand Prize winner in this year's Innovation Competition, focused on improving education for children with reading disabilities. Their DysTherapy application uses platforms and technologies such as MindSpore, ModelArts, Huawei Mobile Services (HMS), and Huawei Cloud to provide personalized high-quality educational content based on each child's reading level and cognitive ability, meeting diverse learning needs.

There were many innovative projects that focused on pain points in various industries and demonstrated tremendous commercial and societal value.

More Humane Technological Innovation: Focusing on Agriculture, Ecology, and Vulnerable Groups

In addition to the Grand, First, Second, and Third Prizes, this year's Huawei ICT Competition Global Final also featured a series of honorary awards: the Green Development Award, the TECH4ALL Digital Inclusion Award, and the Women in Tech Award.

The Green Development Award focuses on recognizing and rewarding contestants who inject new energy into environmental protection and social sustainability through technology, applications, and skills, and who have the ability to promote green development and build a green and intelligent world. The TECH4ALL Digital Inclusion Award recognizes and rewards contestants who have the ability to enable digital inclusion through technology, applications, and skills. The Women in Tech Award recognizes outstanding female participants in the competition to encourage more women to join

technological innovation, promote ICT industry growth, and contribute to social integration and development.


The Atlas Guardian – Smart Agriculture Inspection Robot project from the Charging Forward ICT Team of the Central China Normal University not only won the Grand Prize in the Innovation Competition of this year's Global Final, but also received the Green Development Award.

The WildConnect team from the Cebu Institute of Technology in the Philippines and the SJTUInsight team from Shanghai Jiao Tong University won the TECH4ALL Digital Inclusion Award. The WeiCare Heart Disease Detection App project from the WildConnect team can warn of the risk of heart disease using a smartwatch, reducing the adverse consequences of delayed diagnosis and treatment of diseases. It is expected to be widely used in the medical and healthcare industry. The MindSpore-based Left-behind Children Learning Assistant project from the SJTUInsight team can provide online education resources for educationally underdeveloped areas and left-behind children (children who remain in rural regions of the country while their parents leave to work in urban areas), and has been put into use in schools in Eryuan, Yunnan and other places.

The Women in Tech Award was won by four teams of all female members from Uganda, Morocco, Malaysia, and Kenya.

Riding the Winds of Competition, Embarking on a Journey to the Shining ICT Galaxy

As one of the important talent cultivation initiatives of the Huawei ICT Academy program, the Huawei ICT Competition, after years of effort, has been officially included in the Ranking Lists of National Competitions for College Students published by the China Association of Higher Education (CAHE). It has become one of the most relevant and influential university science and technology competitions. Outside China, the Huawei ICT Competition has been included in UNESCO's flagship projects for key partners of the Global Skills Academy, and its international influence is expanding. The Huawei ICT Academy, a school-enterprise collaboration program, has been in operation for over a decade since its establishment in 2013. As of now, Huawei has cooperated with more than 2,700 colleges and universities worldwide to establish Huawei ICT Academies in more than 110 countries and regions, and has trained over 1 million students.

Huawei hopes that all ICT youth worldwide will ride the favorable winds of the Huawei ICT Competition, using knowledge and technology as their wings, and courage and dreams as their guide, to embark on a grand journey and co-build the intelligent world! 



Four teams of all female members from Uganda, Morocco, Malaysia, and Kenya won the Women in Tech Award in this year's Global Final

A Life-Changing Experience in Mongolia

By Islam Sami / Egypt



When you hear the name Mongolia, it is almost instant that another name, Genghis Khan, will come to your mind. When you visit this country, even though you know very little of its history, you cannot help but to think about life and maybe change your view of it in many aspects.

I still vividly remember my first trip to Ulaanbaatar, the capital of Mongolia. When arriving in the city after some eight hours of flying, I found that it was freezing cold there – it is generally considered the coldest capital in the world. From the moment the airplane crossed the border, all you could see there was vast spaces of land covered with ice and snow. How did those ancient Mongolians, mere mortals, in small numbers and led by their great Khan, have the courage and the will to cross these vast areas on horseback? That is something just beyond our comprehension in this modern world of the 21st century.

I traveled there in January to be precise, which is considered one of the coldest times of the year. The airplane information screen was showing the air temperature at -63°C before landing. Even when the plane landed, however, I found that the temperature outside did not change much. The temperature on the ground was -36°C !

Once I arrived there, the project was already underway and the progress had to be accelerated. On day one, we convened a meeting with our customer's engineer team at their office. Since I had started to support this

project remotely before arrival, there was no delay in setting the work plan for the coming few weeks.

I lived not far away from our customer's office. Every second night I would have to take a nice 20-minute walk from my apartment to the office and back. It was not anything unusual to experience a temperature of -40°C or less even during the daytime. Having several layers of clothing on, I managed to survive one of the harshest weather conditions in the world.





I saw this group of horses feeding while I was having a walk

As I was told, a few kilometers away from Ulaanbaatar, to this day there is a considerable proportion of the local population still following the nomadic lifestyle; living in a “Ger” or “Yurt” as it is called locally, these people are continuously moving to new places whenever they need to find good pastures to feed their animals. The “Ger” or “Yurt”, the traditional Mongolian tent, is made to be highly mobile; it is often made up of a wooden skeleton and covered with animal leather. This provides excellent heat isolation – inside the tent, heating is usually done by burning wood or coal. Such a nomadic lifestyle allowed Mongolian people to always sustain life with the minimal resources.

Ulaanbaatar is a modern city where you can find almost anything you can find in a modern capital, from restaurants offering various types of food, to museums and modern shopping malls. In summer there are always cultural events taking place in several locations of the capital city or other rural areas.

The locals are also known for their beautiful colorful national dresses, with each tribe or group of people having their own styles of dresses. Now everyone has switched to the modern clothing but you can still see people dressed in their national dresses in the celebration of the lunar new year, which is a three-day holiday when it is a custom for the people there to visit their elder family members and show their gratitude and respect. During these three days you will see almost everyone dressed only in beautiful colorful traditional outfits.

The Mongolian plateau had witnessed a different

kind of life long before the existence of human kinds. Dinosaurs used to roam this vast land about 150 million years ago. Most of these dinosaurs’ fossils were found in the south of Mongolia. What is more impressive is that these are not even the oldest habitats of our planet. The oldest earthly life form we know about existed 4,500 million years ago. How much will be our 70 years’ life time amount to when compared with this?

It is said that Mongolia is the land of horses, and it is very true. Around 4 million horses live here while the human population in the country is about 3.5 million. The number of horses exceed the number of people! It is not uncommon to see wild horses roaming on the streets in Ulaanbaatar. I would usually come across horses every time I went for a walk near the place where I stayed.

It took around a month and a half to complete the required work. I was happy that these results were achieved in such a short time and especially in a totally new environment. Before leaving we had a chance to go out for a dinner in one local restaurant with our local office engineers and it was a great opportunity for us to enjoy ourselves away from the formal work environment in the office.

There is much more to write about this amazing country and about what I experienced and learned from my visit there but, due to the limited space, I will have to end this article here. Well, I plan on writing a second episode, which will, if it ever happens, be more about the traditions, people, culture that I may experience during my next business trip there. ②

You Are a Writer at Heart!

Have an experience worth sharing? Drop us a line! *Huawei People* can help amplify your voice and spread your story to Huawei colleagues around the world. We are now seeking contributions from any employee who has a good story to tell. Get your work published, get remunerated, and see your article in print in *Huawei People* magazine. So if you fancy yourself a wordsmith, contact us NOW for a chance to flex your storytelling skills!



We Want:

Work Stories of Individuals

Go to our website and read *A Man, a Cook, and a Dog*, and write us your unique work stories. We want to highlight the contributions of ordinary people who do extraordinary things, because good examples are like a beacon in the dark, they lead and inspire us.

world may feel quite connected.

Team/Project Stories

Read *Stars Along the Mountaintops* and share your own touching team/project stories. We believe the best team and project stories reflect our company's purpose and core values, on which the

Life Stories of Individuals

What Do I Do in Office? is a story about how a daddy explains his work in Huawei to his 5-year-old son. Share with us your own touching, inspiring or life-changing experiences during your career at Huawei. Your readers around the

company was built and still rest on today.

Opinions

Read *Why Protecting IPR Should Matter to Us All* and share your opinions on issues and policies at Huawei. The best submissions offer fresh insight, critique ideas, actions, and policies – not people, suggest



solutions, and align with the core values of Huawei.

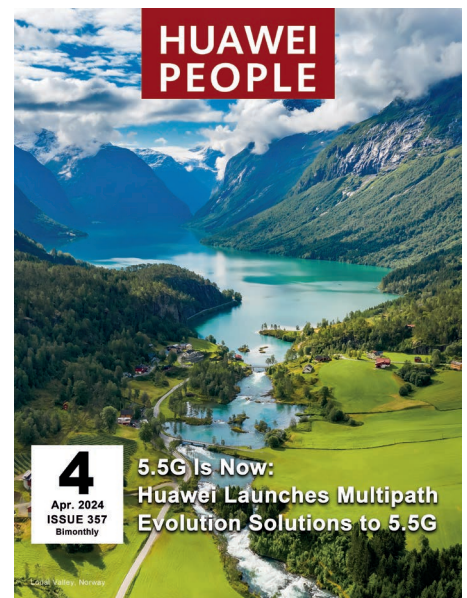
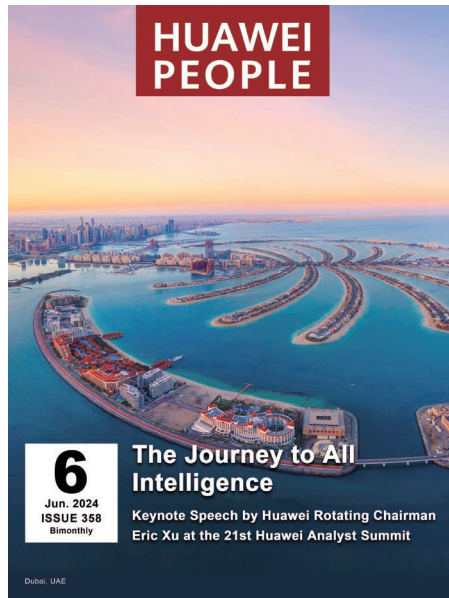
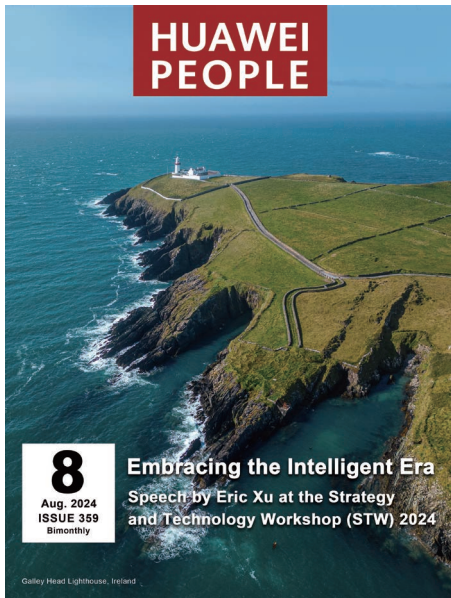
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