DECEMBER 2019 | EDITION #4



Welcome to the fourth edition of InstaDeep's quarterly newsletter, the last one of the decade summing up Q4 2019. It was our best-ever quarter and we are proud to share our updates with you below. Enjoy!

INSTADEEP LAUNCHES AI PRODUCT: INTRODUCING DeepPCB™: FIRST PURE AI-POWERED PRINTED CIRCUIT BOARD

27th November 2019 marked the day when InstaDeep's first AI product – a Reinforcement Learning-powered platform set to revolutionise Electronic Design Automation – went live!

The Printed Circuits Board (PCB) router, DeepPCB[™], is a disruptive scalable product and a world-first innovation in its sector with major future implications. It is an entirely automated, no-human-in-the-loop cloud-native product accelerating AI innovation in hardware. It allows the user to upload their own board and get results in less than 24 hours, potentially accelerating customer development cycles by weeks, if not months.

The product received instant traction with more than 100 new users within the first 24 hours! The beta version is available for free and will pave the way for the full product set to launch in H1 2020. The InstaDeep team has worked incredibly hard to get the cutting-edge product ready – a huge thank you to everyone involved!

READ THE FULL STORY HERE

NEURIPS 2019: AlphaNPI PRESENTED IN FRONT OF IMPRESSIVE AUDIENCE

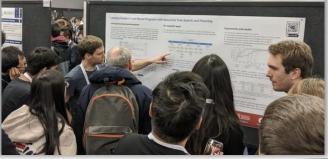
This December, six InstaDeep colleagues travelled to Vancouver, Canada to present our latest cutting-edge research on the main stage at the world's most prestigious AI conference, NeurIPS. AlphaNPI, the joint InstaDeep-Google DeepMind research published earlier this year, was awarded a spotlight talk, meaning it was in the top 2.4% of submitted papers. InstaDeep's AI Researcher Thomas Pierrot had the honour of presenting to an audience counting thousands of people. Following the talk, the team proceeded to present the work in a poster session, again attracting plenty of people asking precise and insightful questions.

The conference created a unique opportunity for the team to meet and interact with the best AI researchers and engineers in the world, including David Silver (AlphaGo), Richard S. Sutton (RL pioneer) and Oriol Vinyals (AlphaStar). It was humbling and incredible to see our work receiving great recognition, a validation of InstaDeep's research and engineering being truly world-class. The team travelled home full of new ideas on how to further contribute to the development of AI in industry and position InstaDeep on the AI world map.

READ MORE HERE









CHANNEL PARTNERSHIP EXPANSIONS:

INSTADEEP BECOMES CERTIFIED SERVICE DELIVERY PARTNER FOR NVIDIA AND PARTNER WITH CLOUD DATA PROVIDER NETAPP

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After thorough reviews, including a half-day technical assessment and a research review, InstaDeep is approved as a fully-fledged Service Delivery Partner (SDP) for hardware giant Nvidia. As an SDP partner, InstaDeep is one of a handful of vetted partners in Europe and the only one in Africa and the Middle East to support Nvidia and their clients with ML and AI expertise. The partnership is already coming to fruition through mutually beneficial client conversations and potential research collaborations. The collaboration with Nvidia has steadily strengthened over the last year, from being an inception partner and presenting at Nvidia's GTC events.

Furthermore, we have successfully completed the onboarding process with cloud data services and data management company, NetApp. This partnership will focus on exploring opportunities together where we can provide the full end-to-end solution including cloud and data structure as well as the most cutting-edge AI.

We see great synergy with both companies and look forward to embarking on two exciting partnership journeys.

INSTADEEPERS IN ACTION AT DEVFEST LAGOS...

On the 2nd November, Google Developer Group Lagos hosted Africa's biggest developer event, DevFest Lagos 2019, where InstaDeep featured as a silver sponsor. With more than 2500+ people in attendance, we are beyond proud to support the initiative, seeing the raw enthusiasm and hunger for new ML knowledge all around. The daylong conference saw Orevaoghene Ahia and George Igwegbe give a talk on InstaDeep's Enterprise AI systems for mobility, logistics, manufacturing and energy.



AND AT DEVFEST MANOUBA AND CARTHAGE!

DevFest Lagos was not the only event we were present at! In Manouba

and in Carthage, both in Tunisia, InstaDeepers Sabrine Krichen and Nourchene Ferchichi conducted workshops on Computer Vision, sessions giving the attendees an opportunity to learn about the basics of Computer Vision and its applications. Not only did the participants enjoy learning about AI, Sabrine and Nourchene really got the hang of presenting and are excited to give more talks in the future!





KEYNOTE AND PANEL DISCUSSION AT AAIS19

The last week of October, Youssef Ben Dhieb and Nouchene Ferchichi travelled to Jordan to participate in the Arab Artificial Intelligence Summit 19! Youssef was on a panel on AI entrepreneurship, while Nourchene delivered an impressive keynote on AI implementation. Well done both!



FLYING HIGH IN SILICON VALLEY

December 2019 saw Plug And Play's Winter Summit for the Travel and Hospitality sector unfold in Silicon Valley, and on stage to present InstaDeep was Dr. Sinda Ben Salem. She talked the audience through how InstaDeep's expertise in AI, with a special focus on RL and DL, can help the industry optimise their operations. Attended by world-leading businesses, the conference brought productive conversations and valuable connections to explore further in 2020.



LAGOS TEAM BUILDS A WORLD-FIRST NLP TRANSLATION MODEL

Remarkable achievements by Orevaoghene Ahia and Kelechi Ogueji in InstaDeep's Lagos team on building the world's first Pidgin-to-English translation model using Natural Language Processing (NLP).

The unique language model is built to fill a gap in language translation models which today mainly cater to very high-resource language speakers. With few data sources available, the InstaDeep duo trained an unsupervised Neural Machine Translation model, and essentially created a pidgin-English catalogue of word pairs from scratch, scraping 56,695 pidgin sentences and 32,925 unique words from only a few websites.

After peer review, the paper, PidginUNMT, was selected for presentation at NeurIPS 2019, however, due to dubious visa standards by the Canadian embassy, the researchers were denied the honour of presenting at the world-renowned conference.







PREFERRED PARTNER

NetApp



Below are some of our news highlights for you to read in full!

TechCabal: The world's first pidgin-to-English translation model

Inspire Middle East:

start-ups are changing

How Tunisia's tech

the entrepreneurial ecosystem

SOCIAL HUB



How Tunisia's tech start-ups are changing the entrepreneurial accesses

Intel on AI Podcast: Featuring Karim Beguir:



FURTHERMORE AROUND

Karim spoke at the Intel O'Reilly AI Conference in London.

We hosted our second AI in Industry event with focus on AI and Ethics.

> We visited NVIDIA's GTC conference in Washington DC.



Two InstaDeepers recognised as Google Experts in ML



Huge congratulations to AI Research Engineer Rihab Gorsane and Research Engineer Youssef Ben Dhieb on qualifying as a Google Developer Expert in Machine Learning! The news broke in early

October and the pair are now two of five in-house Google ML experts at InstaDeep, all in a very exclusive world-wide club

of fewer than 150 people. Additionally, Rihab is the first female to receive the qualification in the MENA region - an incredible achievement. Well done both!



Zohra Slim selected as

Our very own Co-Founder and CD&VO, Zohra Slim, was chosen as one of the top 10 most inspiring women in tech in Tunisia on the Womenpreneur Tour 2019!

The joint initiative by SANAD

Karim Beguir featured on the Top 100 Managers List in Tunisia in Enterprises Magazine!

Are these the 10 biggest deals by

African tech startups in 2019?



euronews.

thought leaders and role models in the MENA region. The main goal of the tour is mapping and connecting existing and aspiring female entrepreneurs in technology, digital innovation and entrepreneurship and, consequently, drawing attention, resources and serious actions to support female digital talents and women-led tech enterprises. Keep your eyes peeled for the upcoming documentary in 2020!

Entrepreneurship Academy and the Womanpreneur Initiative highlights female

Upcoming Events

JANUARY

NeurIPS Watch Party Tunis, Tunisia

Gatwick Airport Innovation Day London, UK 30th January

FEBRUARY

Plug And Play Smart City Vienna, Austria 20th February

Middle East Rail Dubai, UAE 25-26th February

MARCH

NVIDIA GTC San José, California, USA 22-26^{2h} March

Internal Client Event Munich. Germany 2-3rd March

TensorFlow Dev Summit Viewing Party Tunis, Tunisia

We hope you enjoyed reading our newsletter. For questions or feedback contact communications@instadeep.com

