

DNI Study of Human Intelligence

Collective Intelligence Offers Best Answers to Tough Questions

CUSTOMER NEED

The Office of the Director of National Intelligence (DNI) in the United States asked TechCast for help in assessing the development of human intelligence technologies, which were advancing rapidly. With exploding national security needs following the September 11, 2001 terrorist attacks, DNI had to acquire these capabilities when they were ripe for deployment.

OUR SOLUTION

TechCast conducted a study using its experts to estimate when five crucial technologies would be commercially available, when each would reach the mainstream of 30% adoption in English and for complex languages, and the potential size of the economic market. This was a crucial study because it demonstrated the flexibility of our forecasting method. The required assessments were beyond the scope of standard published research products. We applied the same principles of collective intelligence, and obtained good answers, demonstrating our special ability to “provide best possible answers to tough questions.”

CUSTOMER BENEFITS

Results of this custom TechCast research study for Speech Recognition, Language Translation, Image Recognition, Non-standard Language and Emotion Identification technologies are presented below. The study and its results are unclassified. Using the study results, DNI was subsequently able to acquire these crucial technologies and apply them for terrorism and other security matters.

Technology	Commercial Introduction	Mainstream (30%)	Complex Language	Market Size
Speech Recognition	2009	2016	2018	\$5.1 B
Language Translation	2013	2018	2019	\$10.5 B
Image Recognition	1997	2013	2022	\$4.9 B
Non-Standard Language	2017	2023	2023	\$1.7 B
Emotion Identification	2014	2019	2021	\$3.1 B

Standard Deviation (SD) = between 3-5 years