

# Success Stories NCC Finland

Name (NCC FINLAND),

Date May 20<sup>th</sup> 2022

E-mail Dan.Still@csc.fi

Industrial HPC Course



# EURO

# SUCCESS STORY IN SPEECH RECOGNITION INDUSTRIAL DOMAIN

Speechly Finland <https://www.speechly.com/>

Speechly removes the complexity of Spoken Language Understanding with a simple to use API that makes it easy to add integrated voice features to websites and mobile apps.

Need to train large deep learning models to provide AI solutions such as in Speechly case real time spoken understanding to customers. Modern deep learning models require large amounts of compute capacity.

SUCCESS STORY  
DETAILS  
HPC provider: CSC IT  
Center for Science Ltd.  
Country: Finland  
Link [www.csc.fi](http://www.csc.fi)

## THE HPC PROBLEM DOMAIN

Training large, deep neural network models for speech recognition on large datasets takes a long time on a single GPU, motivating the use of concurrent processing.

## THE SOLUTION

- A single model training run can take anywhere from days to weeks. Thanks to CSC's computing capacity, Speechly was able to work much faster than before and with significantly more data

## THE BENEFITS

During the project, Speechly was able to improve the recognition accuracy of our speech recognition model by more than 60% as measured by word error rate,