

Procurement, Ethical AI in Learning – co-development challenge for companies

Decision

The Director of Economic Development decided to accept Kwantum LLC's tender as the solution to be implemented in the Ethical AI in Learning co-development challenge as the most economically advantageous tender.

The total value of the procurement is EUR 59,000 (excluding VAT).

The costs involved in the procurement will be paid from budget item 1812102 of the Innovations and New Experiments Unit of the City of Helsinki Economic Development Division.

The planned term of agreement is 15 August 2022–31 June 2023.

A binding agreement between the parties will be concluded at a later date with the signing of a separate procurement agreement.

Justifications

According to the Helsinki City Strategy 2021–2025, the city strengthens and develops its position as a top start-up hub, innovative environment and hotbed of business opportunity in Europe. Helsinki must be an attractive environment for testing new solutions in the urban environment. The 'Helsinki as a development and testbed' project develops a service model for testing and platform activities and promotes the scaling and further development of the best solutions developed on the platforms. The Helsinki development and testbed entity includes five content-based platforms: health and well-being, learning environments, clean and sustainable urban solutions, mobility as well as digitalisation and data utilisation.

As part of the 'Helsinki as a development and testbed' project, an innovation competition for the development of an ethical learning-related AI solution is implemented under the 'learning environments' platform. The aim is to co-develop AI-based solutions for personal learning and producing individual learning materials that pay particular attention to ethical approaches (such as non-discrimination, transparency of AI solution and non-profiling of users). The solution will be developed together with experts from the City of Helsinki Education Division based on city guidelines and instructions on the utilisation of ethical AI solutions.

The procurement has been carried out as a minor procurement below the threshold values listed in the Procurement Act.

The call for tenders (Appendix 1) was published on the city website at <https://testbed.helsinki> and also distributed on the city's social media channels and in international networks of companies in the sector. The deadline for submitting tenders was 4 pm (UTC +3) on 13 April 2022, by which time nine (9) tenders were received.

The tenders met the requirements set out in the call for tenders, with the exception of the tenders submitted by Science Pitchers and IdeasGym. The tender by Science Pitchers and the first tender by IdeasGym exceeded the maximum total price specified in the call for tenders. The second tender by IdeasGym failed to mention that the solution in question would operate in the Microsoft Azure environment. Therefore, in accordance with the conditions set out in the call for tenders, these tenders were excluded from the competitive tendering.

The remaining six tenders were assessed in accordance with the criteria indicated in the call for tenders, namely:

1. Suitability of the AI solution for the use of City of Helsinki schools and the learning conceptions used, 25 points
2. Innovativeness of the trial, 20 points
3. Scalability of the service, 10 points
4. Pricing, 10 points
5. References and suitability of the implementer, 10 points
6. Preliminary assessment of the ethical approaches of the AI solution, 25 points

The five companies with the highest tender scores were invited to present their solution at a pitching event held on 3 May 2022. In accordance with the call for tenders, the solutions' pedagogical suitability and effectiveness for learning and teaching was assessed at the pitching event, and the technical preconditions for the implementation of the trial were further specified. The final selection was made based on the pitch, as indicated in the call for tenders.

Based on the pitch, the tender submitted by Kwantum LLC responded best to the criteria listed in the call for tenders. The tender was also in line with the contents explored in the pitching event. The pedagogical added value to the learning process provided by AI technology was clearly demonstrated. In terms of pedagogical ethics, the solution was excellent, i.e., the role of AI was transparent and the solution did not involve any classification, self-fulfilling prophecies or profiling. The solution's pedagogic innovativeness and its correspondence with the learning conceptions of the Finnish Core Curricula did leave something to be desired. However, the practical pedagogical functionality and feasibility of the solution were excellent. A comparison table of the tenders is attached (Appendix 2).

The right of the Director of Economic Development to approve procurements is based on the Head of Office's decision on the procurement rights of the City Executive Office on 4 January 2021, Section 3.

Appendix 1. Call for tenders

Appendix 2. Comparison table

Extract: tenderers

Instructions for appeal on a procurement decision, minor procurements, City Board