

From Fig. 10, it can be concluded that in most of the time both of the participants' emotional states were estimated as a "Neutral". It should be noted that the statistical results are determined only for frames, for which the faces were detected by the algorithm (67% of the meeting time for the Participant ID1 and 79% - for the Participant ID2).

3. Conclusions

In this paper we propose a conceptual architecture and an algorithm, applicable specifically for the purposes of innovation in business modeling. The proposed model includes: participants' extraction, background removing (or replacement), participants' behavior analysis (which we further classify as intra and inter-group analysis) and data recording. Behavior analysis includes: finding out the looking direction (by assessing the orientation of the head) and emotional state assessment (by estimating the facial expression). During the meeting, four possible looking targets are taken into account. These are: participant is looking at the Working Station; participant is looking at other participant; participant is looking at the screen or participant is looking at some other place (i.e. distraction state). We show the statistical information of the estimated profile for the particular participants in a real case scenario.

The proposed conceptual model architecture and an algorithm can be easily adapted by businesses by integrating other sensors (ex. stress wearables) and machine learning techniques to observe, analyse and predict human behaviour and facilitate the digitalization of the BMI process. This environment should be able to facilitate businesses and organizations by "making" it possible for them to "see", "sense", understand and communicate their Business Models dimensions and components. The business models must "learn" as they are created to enhance the competitive-edge of the businesses.

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