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Implementation of ITRF2020 in the ILRS Operational Products

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The ILRS contributed to the development of ITRF2020 via the combined products submitted to ITRS. The combined products were the result of the combination of individual AC contributions where a new approach in handling systematic errors at the stations was implemented. A set of a priori estimated mean biases was considered for the main period 1993-2020 that includes data from LAGEOS, LAGEOS-2 and the Etalons, whereas an adjusted 15-day average bias at each station for the 1983-1993 period was considered to accommodate systematic and target signature errors, if a priori mean biases were missing. The implementation of ITRF2020/SLRF2020 in SLR operational products required an extended version of the SSEM model, SSEM-X, which led to the finalization of a new DH file. Considering this updated set of long-term mean biases, all ACs produced a solution set based on models used for REPRO2020 and SLRF2020 as input to a combined product intended for the IERS RS/PC at USNO. These EOP series will be used for the calibration of EOP biases prior to the release the final version of the new Bulletin A. The new bias model SSEM-X will be publicly available and maintained current over the coming years.