Summary and Intended Use
The use of controls to monitor the analytical performance and reliability of test methods is an essential component of good laboratory practice.

The Human α-Synuclein Control Pack consists of three levels of controls, each containing known concentrations of α-synuclein protein. Human α-Synuclein Controls 1, 2, and 3 are prepared by spiking recombinant calibrators into diluent. The controls are supplied as frozen liquid.

Storage and Handling
To maximize the consistency of measured values across vials, the controls must be stored at the recommended temperature. Controls can go through four freeze-thaw cycles without significantly changing analyte levels. Discard unused material after the fourth thaw.

To use, dilute controls 8-fold in assay diluent. Add diluted control solutions to the MSD plate (coated with capture antibody) and assay as unknown samples. Discard excess diluted control material after use.

Safety
Use safe laboratory practices and wear gloves, safety glasses, and lab coats when handling controls. Handle and dispose of all hazardous samples properly in accordance with local, state, and federal guidelines. Additional product-specific safety information is available in the safety data sheet, which can be obtained from MSD Customer Service or at www.mesoscale.com.

Assignment of Control Values
The controls are provided to assess reproducibility of assay performance, and precision CVs are expected to be less than 20%. The certificate of analysis contains the concentrations of the controls measured at MSD, across three lots of the U-PLEX Human α-Synuclein Kit (Catalog #K151WKK-1). Even with good laboratory practices, site-to-site differences may occur. Therefore, to set accuracy specifications, it is recommended that each lab establish its own nominal values and acceptance range for control concentrations.