

Addendum #2: TuneLab™ Models for Antibodies

The models listed below are representative examples and will evolve over time. Each model will be documented by Lilly, including experimental protocols (assays), calculation protocols (how experimental readouts have been processed) and model algorithm.

Model Endpoint	Description
Hydrophobicity/Aggregation	Predictor with risk classification heuristics (Low/Med/High) to assess hydrophobicity burden trained on HIC retention time
Thermal Stability	Predictor with risk classification heuristics (Low/Med/High) to assess the melting temperature as determined by Differential Scanning Fluorimetry (DSF) of an antibody
Non-specific Binding	Predictor with risk classification heuristics (Low/Med/High) to assess non-specific binding as defined by Meso Scale Discovery-Nonspecific Binding (MSD-NSB)
Solubility	Predictor with risk classification heuristics (Low/Med/High) to assess if sequence represents an antibody that will be soluble or not, trained on PEG-induced precipitation
Chemical Liability (Deamidation)	Predictor with risk classification heuristics (Low/Med/High) to assess deamidation by LC-MS
Viscosity	Predictor with risk classification heuristics (Low/Med/High) to assess viscosity by viscometer at high concentrations