NMC connectivity creation with OTSi physical constrains - supportable-transmission-totalpower-range PHTN SIP per **PHTN** - supportable-reception-total-power-TPND Line port NNI range NNI PHTN CSEP characterization for NMC Already defined: physical impairments validation: supportable-modulation Not-defined vet: supportable-application-identifier required-ingress-total-power-range - total-power-warn-threshold required-egress-total-power-range Already defined: CS constraints needed for NMC otsi-config/modulation (conditional to service-layer=NMC) nmc-config/spectrum physical impairment validation (delta concept): Not-defined yet: **TPND TPND** - max-osnr-penalty-tolerated Node Node - max-chromatic-dispersion-penalty-Mapping LS SIPs to its tolerated PHTN SIPs (via config - max-pmd-penalty-tolerated others? OLS NBI Context **PHTN Connectivity Service** OLS SIP per ROADM Add/Drop port CEP characterization to enable physical impairment validation (Not-yet defined): measured -osnr-ingress (estimated value might be included in the model) Device measured-osnr-egress Node Already-defined: NodeEdgePoint measured-power-ingress OLS O NMC O ConnectionEndPoint measured-power-egress Domain MediaChannel ConnectionEndPoint OMS MC Node ServiceInterfacePoint O OTS MC Connectivity ServiceEndPoint PHTN Link PHTN Link INLAMP O OTS MC O Connection O OTS MC O **ROADM ROADM ROADM** Assumption: OMS/OTS ConnectivityService Node PHTN Link Node PHTN Link Node Node Connectivity is pre-configured □ □ Link Transitional Link