Result of interpolation of function y(x) = sin(x)· e^{-x}
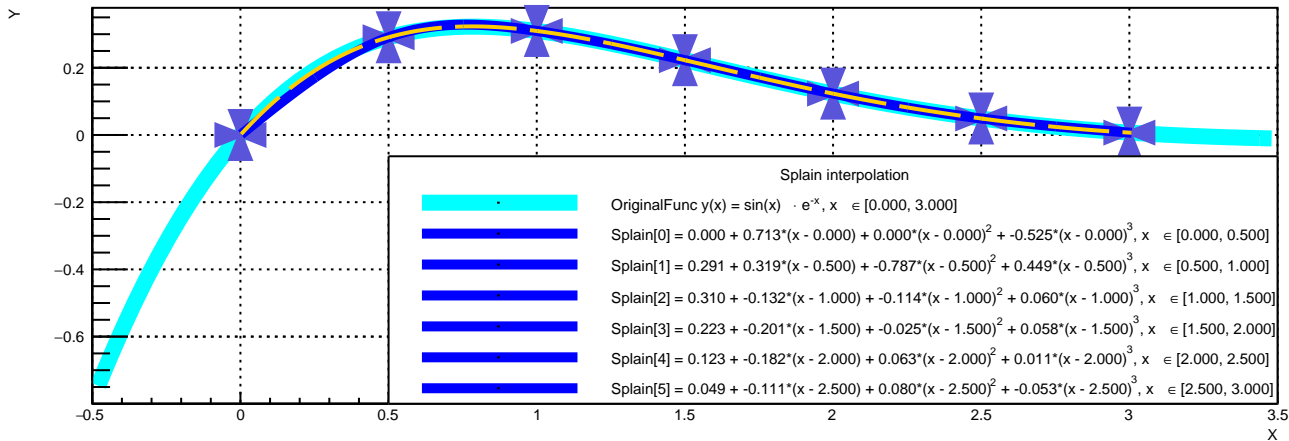

Splain interpolation

OriginalFunc y(x) = sin(x) · e^{-x}, x ∈ [0.000, 3.000]

Splain[0] = 0.000 + 0.713*(x - 0.000) + 0.000*(x - 0.000)^2 + -0.525*(x - 0.000)^3, x ∈ [0.000, 0.500]

Splain[1] = 0.291 + 0.319*(x - 0.500) + -0.787*(x - 0.500)^2 + 0.449*(x - 0.500)^3, x ∈ [0.500, 1.000]

Splain[2] = 0.310 + -0.132*(x - 1.000) + -0.114*(x - 1.000)^2 + 0.060*(x - 1.000)^3, x ∈ [1.000, 1.500]

Splain[3] = 0.223 + -0.201*(x - 1.500) + -0.025*(x - 1.500)^2 + 0.058*(x - 1.500)^3, x ∈ [1.500, 2.000]

Splain[4] = 0.123 + -0.182*(x - 2.000) + 0.063*(x - 2.000)^2 + 0.011*(x - 2.000)^3, x ∈ [2.000, 2.500]

Splain[5] = 0.049 + -0.111*(x - 2.500) + 0.080*(x - 2.500)^2 + -0.053*(x - 2.500)^3, x ∈ [2.500, 3.000]

0