

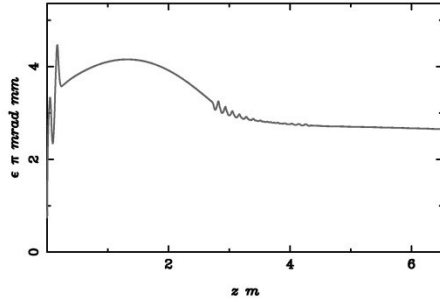
Bunch Orientation Test

Astra Simulation

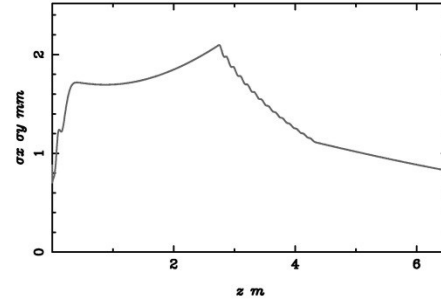
Cody Haberland-Hagman
Bunch Orientation Test
DESY Zeuten, 14.04.2016

Lineplot Overview

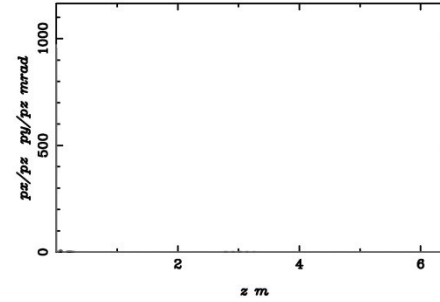
Transverse Emittance



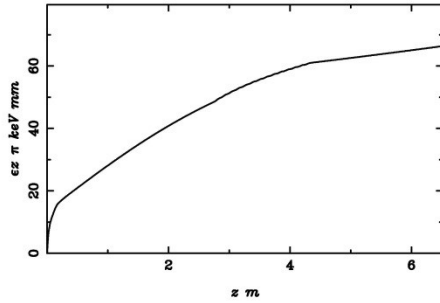
Beam Size



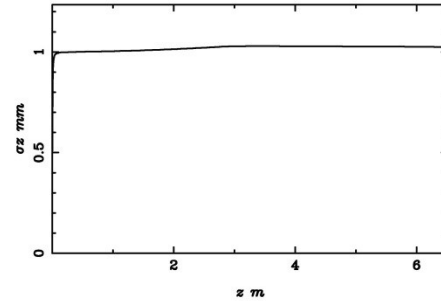
Beam Divergence



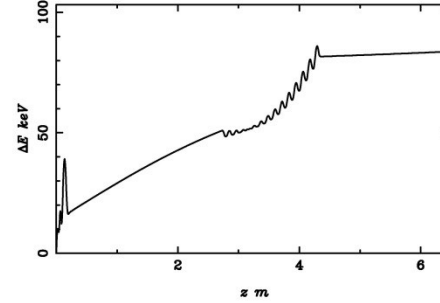
Longitudinal Emittance



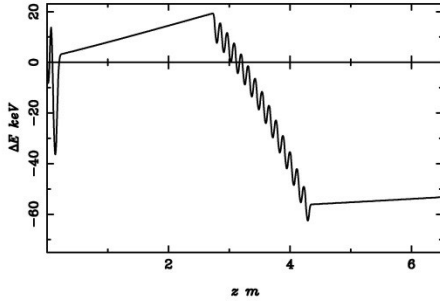
Bunch Length



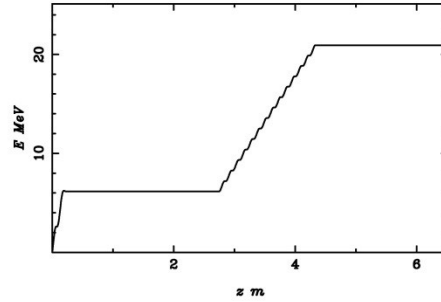
rms Energy Spread



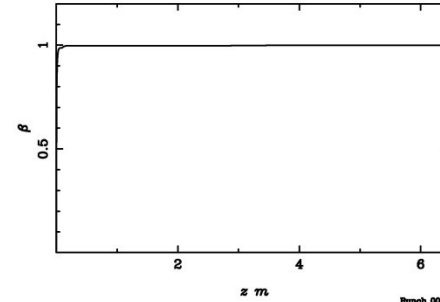
correlated Energy Spread



average particle energy



Particle velocity



Runch 001 12.04 11:54



Input File

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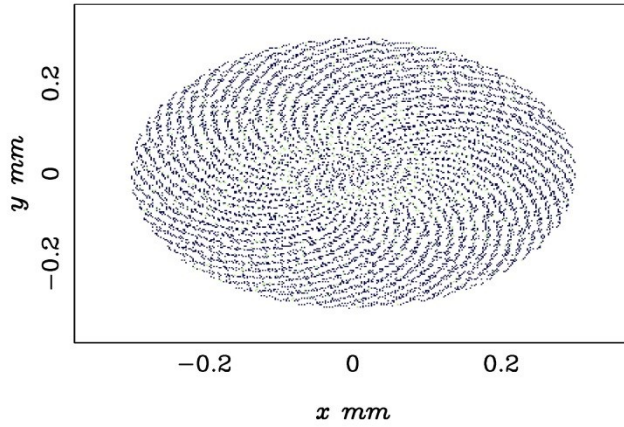
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cor_px=0.0E0
/

&INPUT
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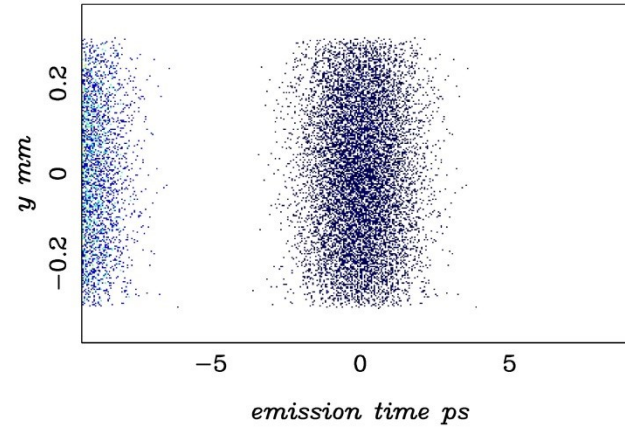


Front, Side and Top View

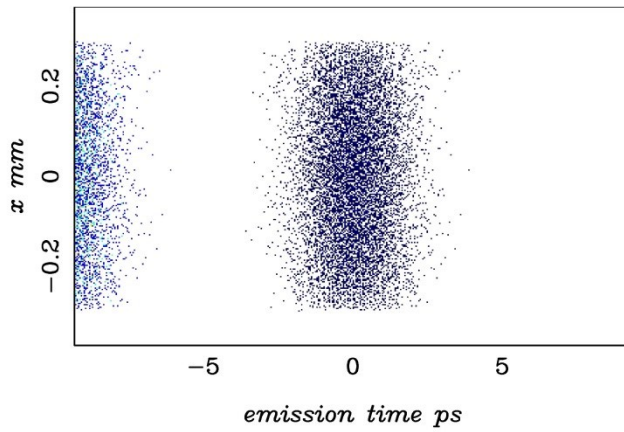
Front view



Side view



Top view

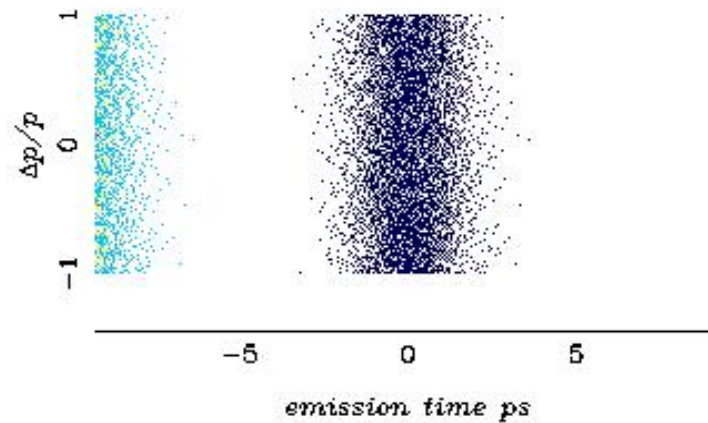


beam.int 18.04 1048

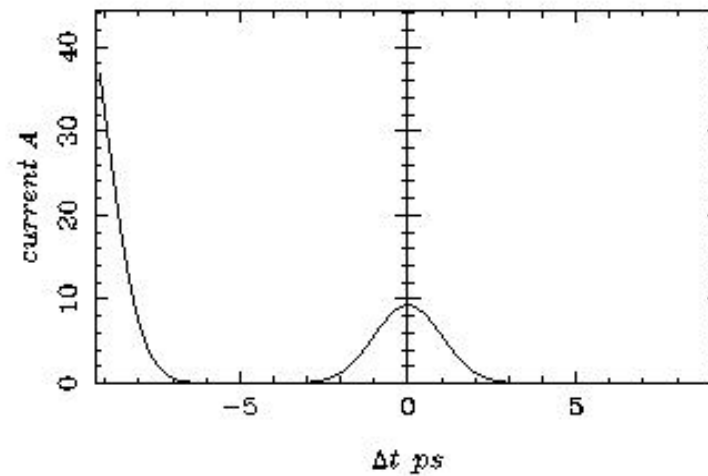


Longitudinal Distribution – Input File

Longitudinal Phase-Space

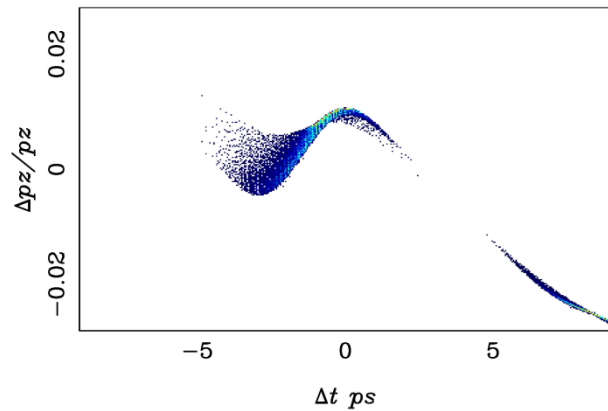


Longitudinal Distribution

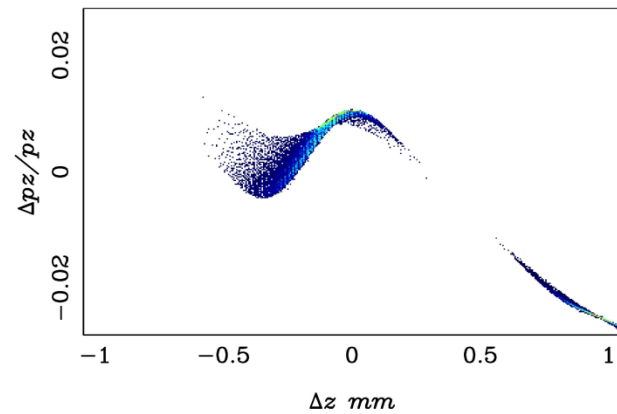


Longitudinal Distribution 0.001m

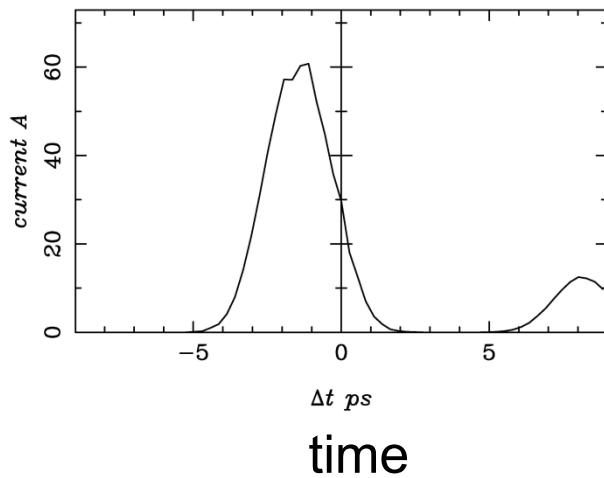
Longitudinal Phase-Space



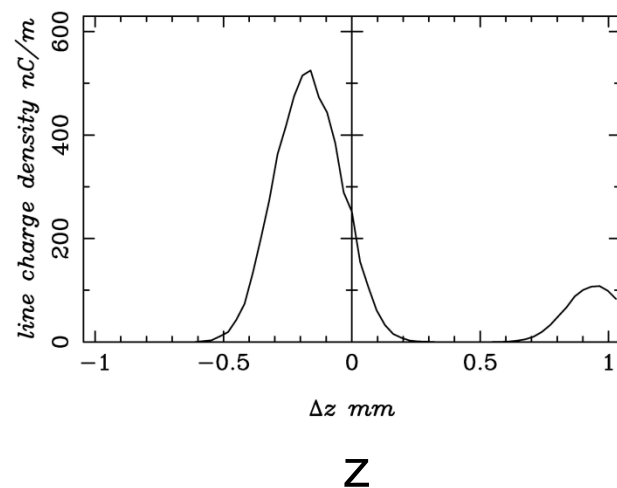
Longitudinal Phase-Space



Longitudinal Distribution

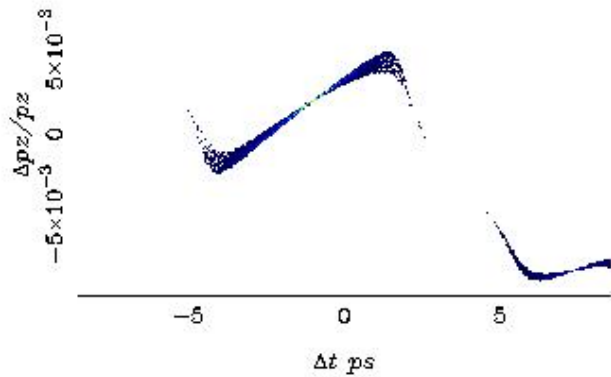


Longitudinal Distribution

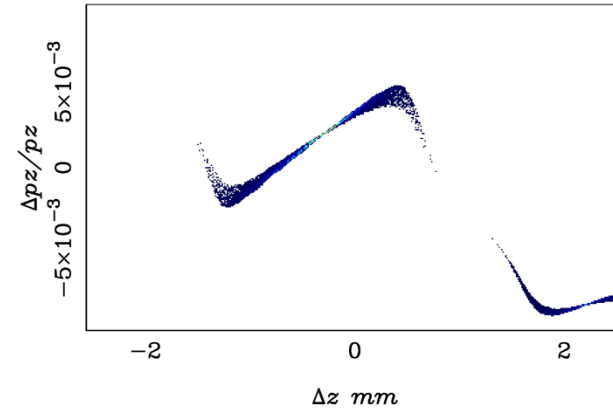


Longitudinal Distribution 6.514m

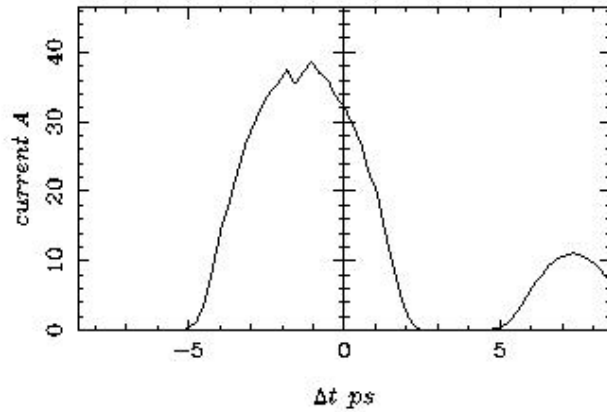
Longitudinal Phase-Space



Longitudinal Phase-Space

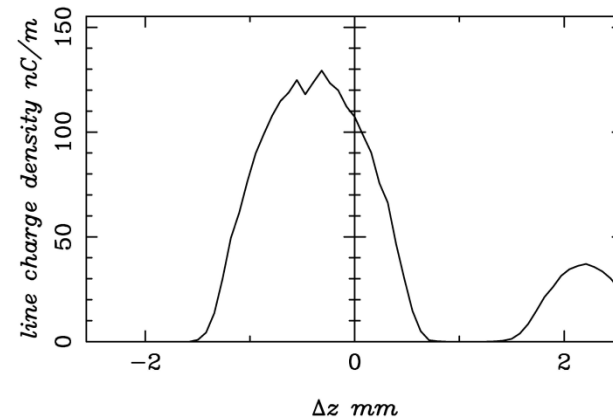


Longitudinal Distribution



time

Longitudinal Distribution



Z



Absolute Charge Positions

