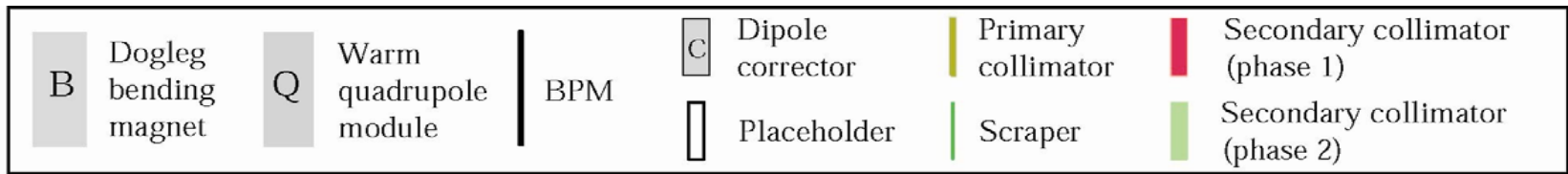


# Radiation levels in the regions UJ76/RR73/RR77

Case Study: Three Absorbers per beam  
A6vC6hE6v → Beam1 & Beam2

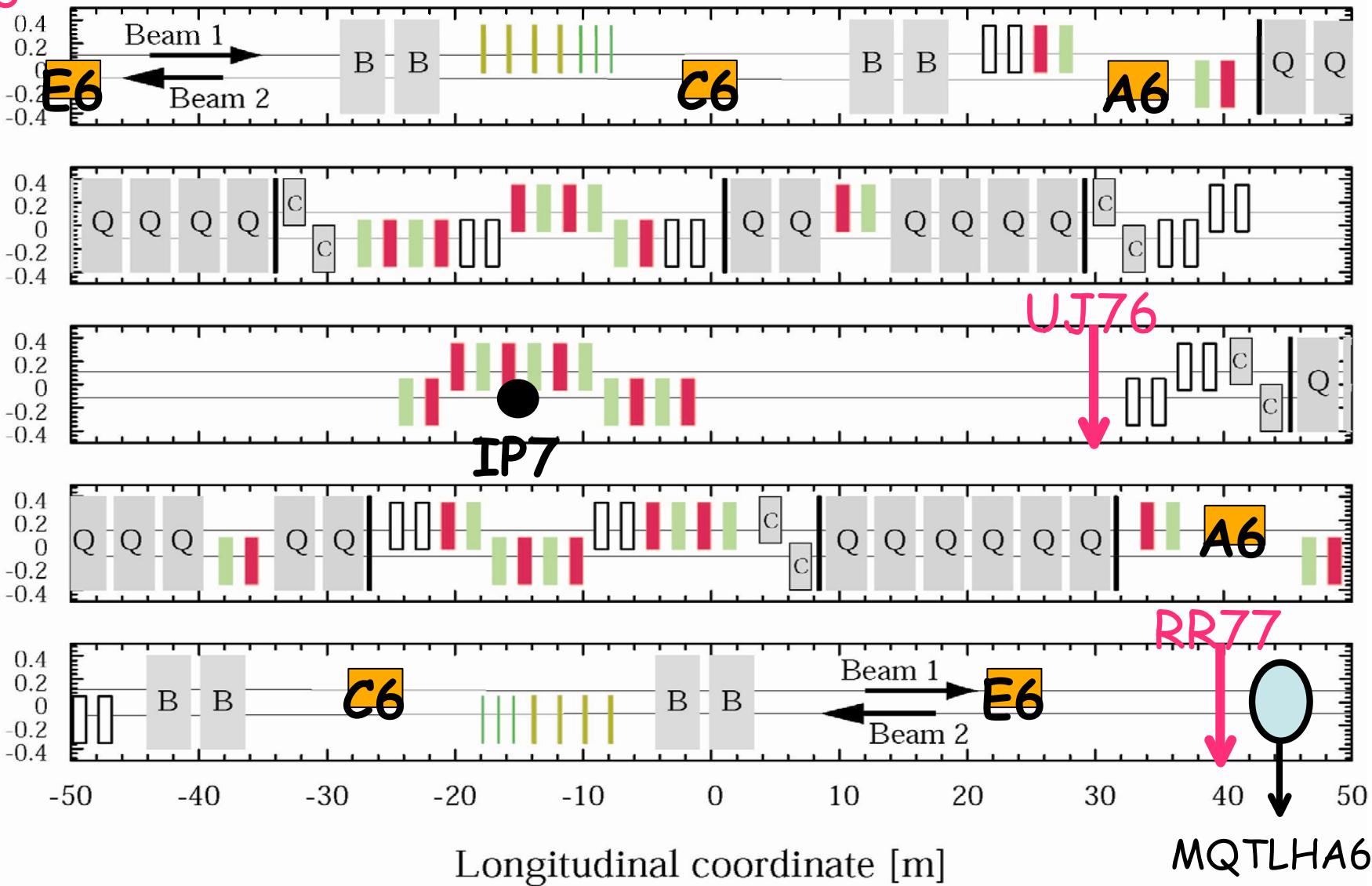
Katerina Tsoulou  
Alfredo Ferrari, Vasilis Vlachoudis,  
Mario Santana, Matteo Magistris

Collimation WG Meeting, 19/11/04

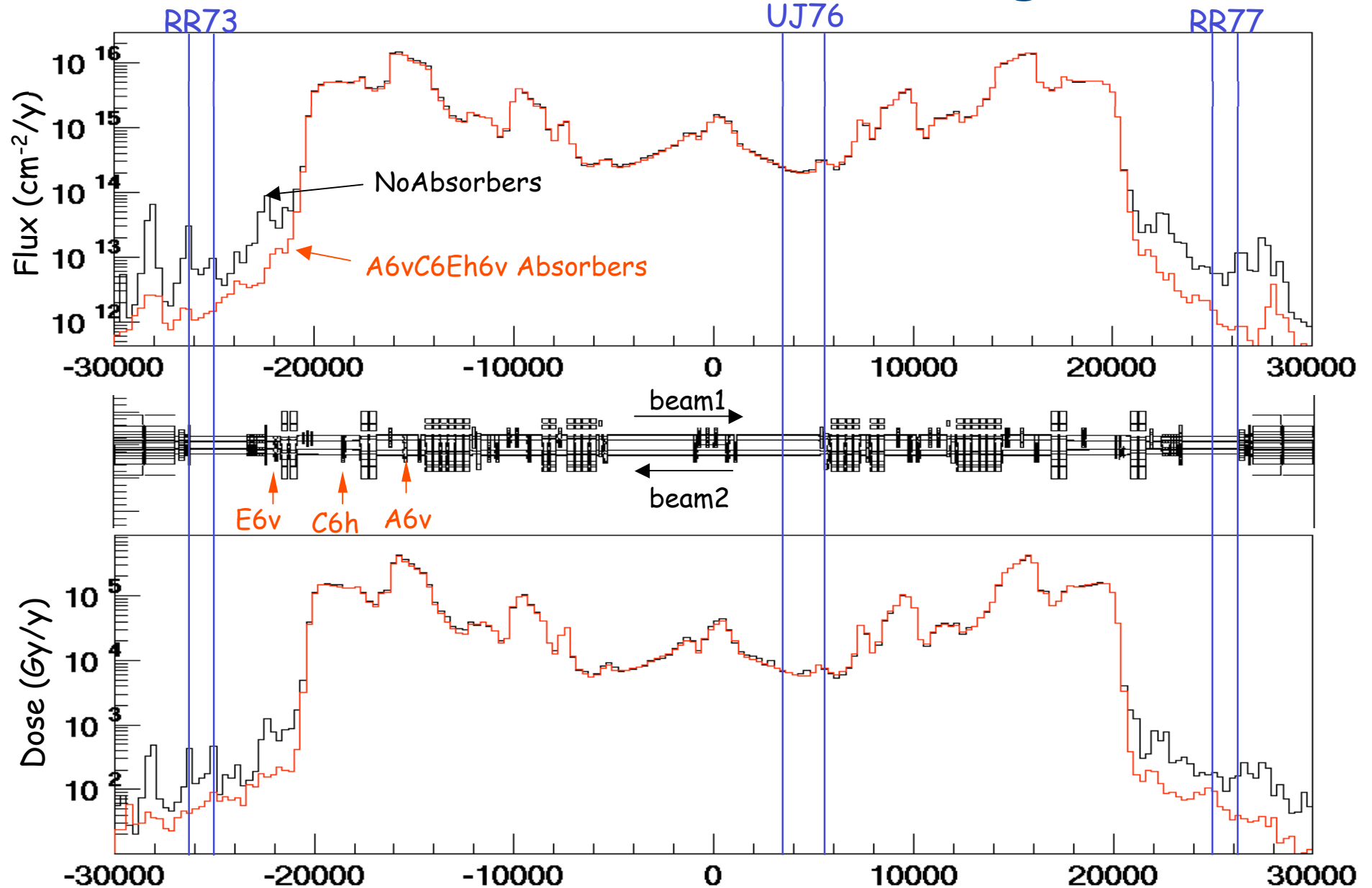


RR73

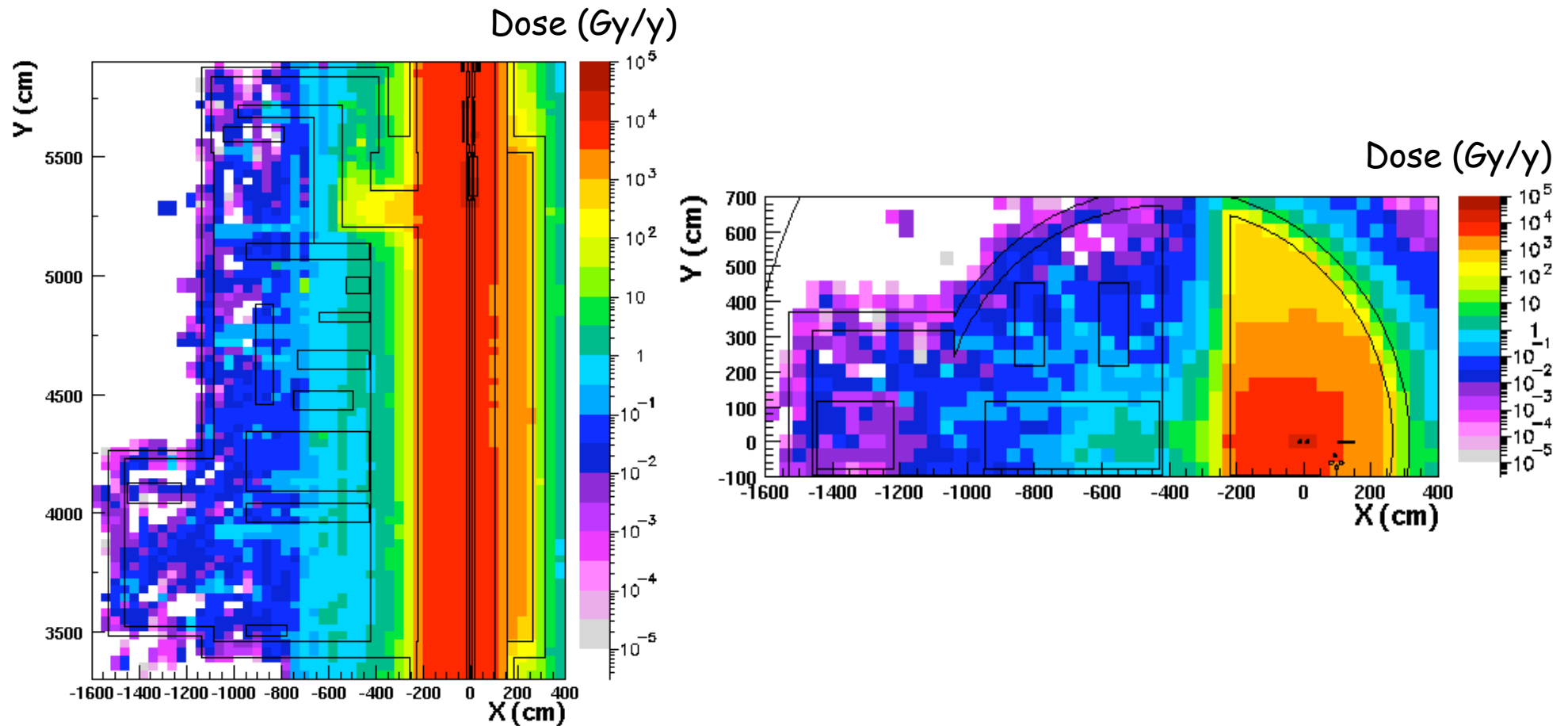
Horizontal coordinate [m]



# NoAbsorber vs. Absorber Case Along the Tunnel

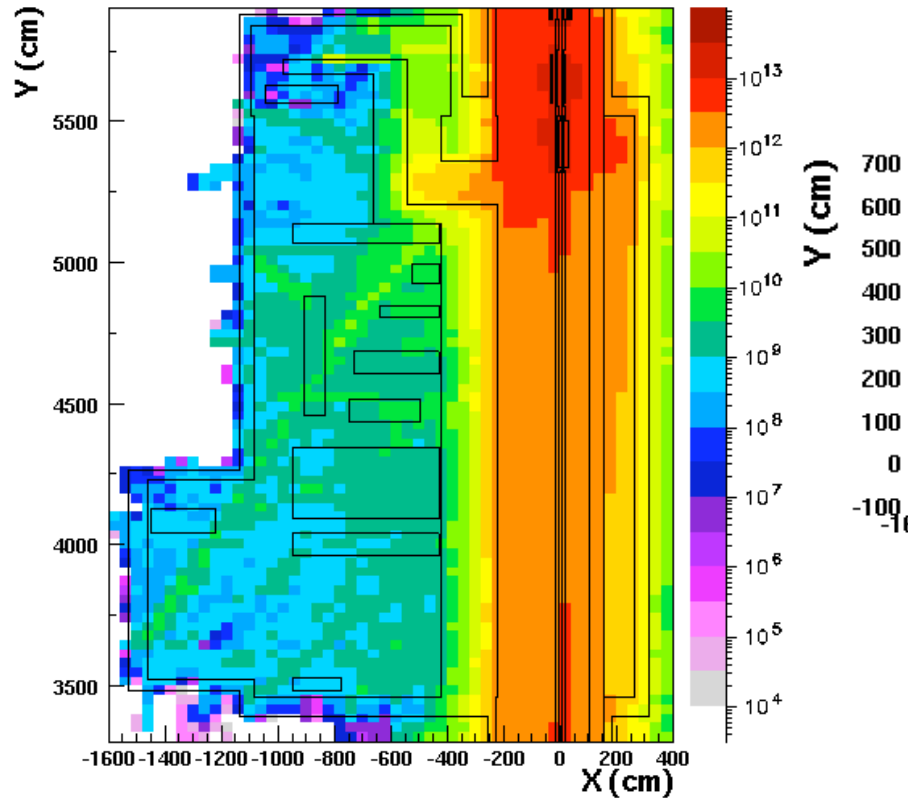


# Dose in UJ76 (Gy/year)

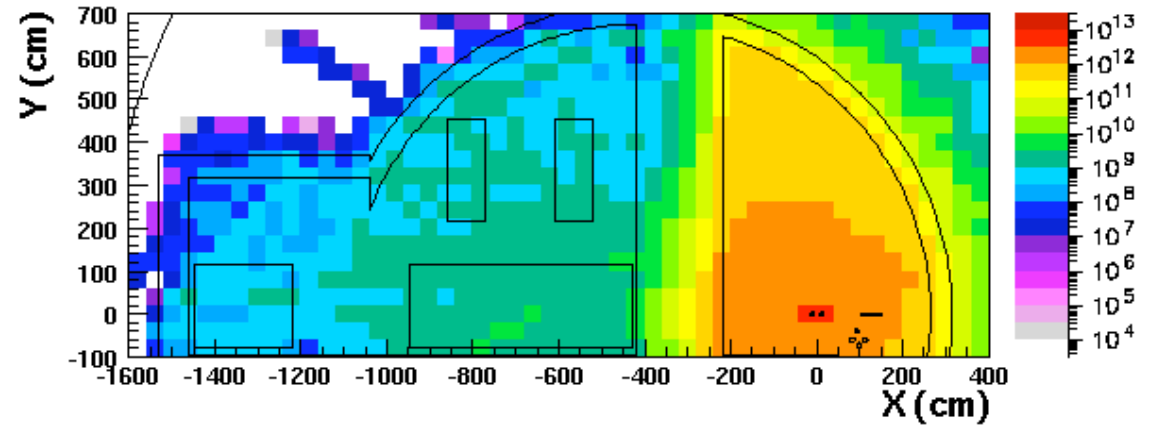


# 1MeVeq In UJ76 ( $\text{cm}^{-2}/\text{year}$ )

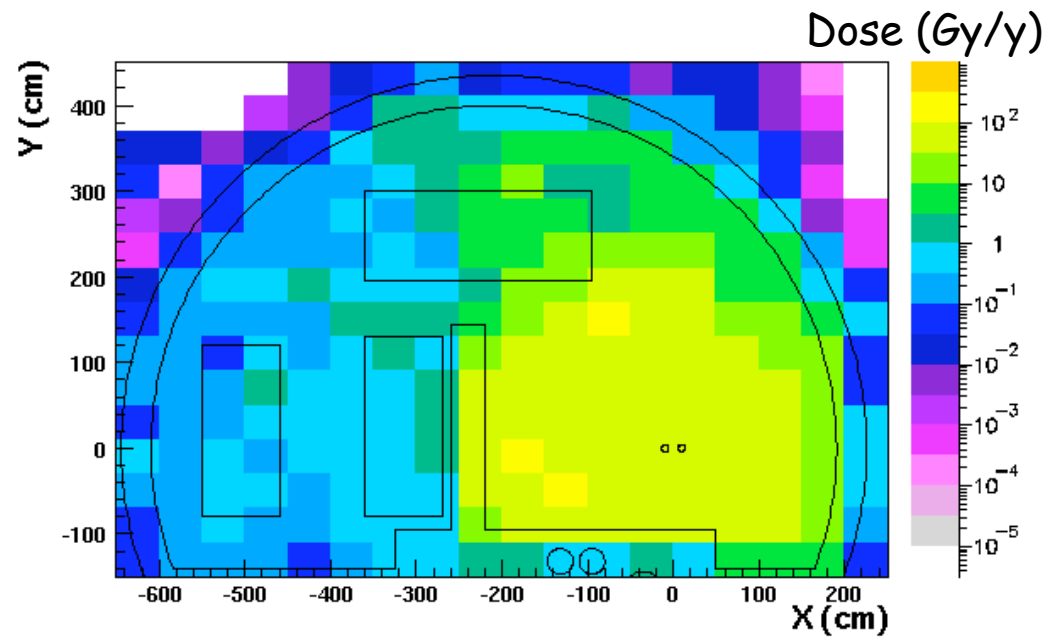
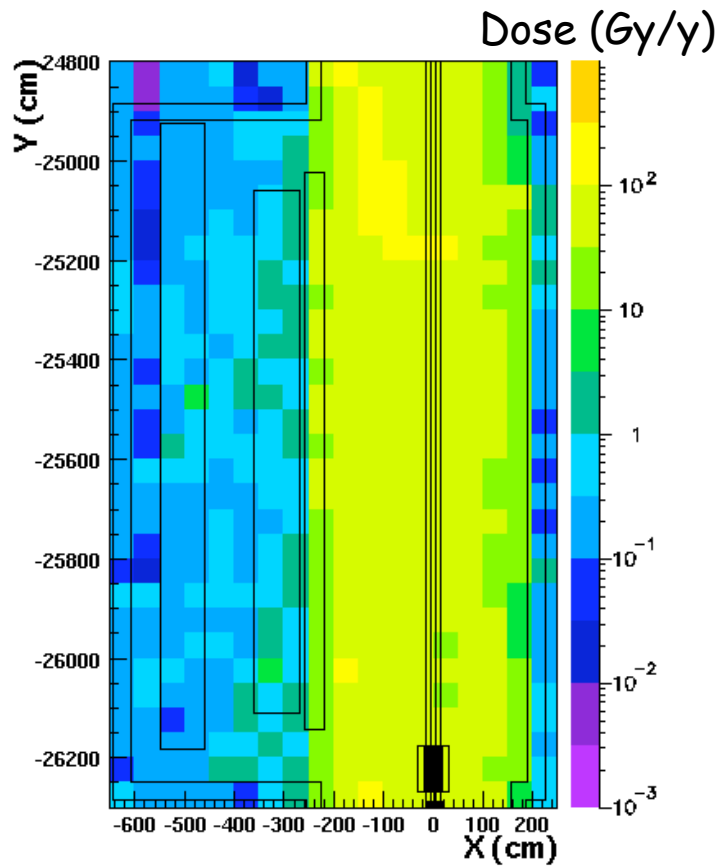
1MeVeq flux ( $\text{cm}^{-2}/\text{y}$ )



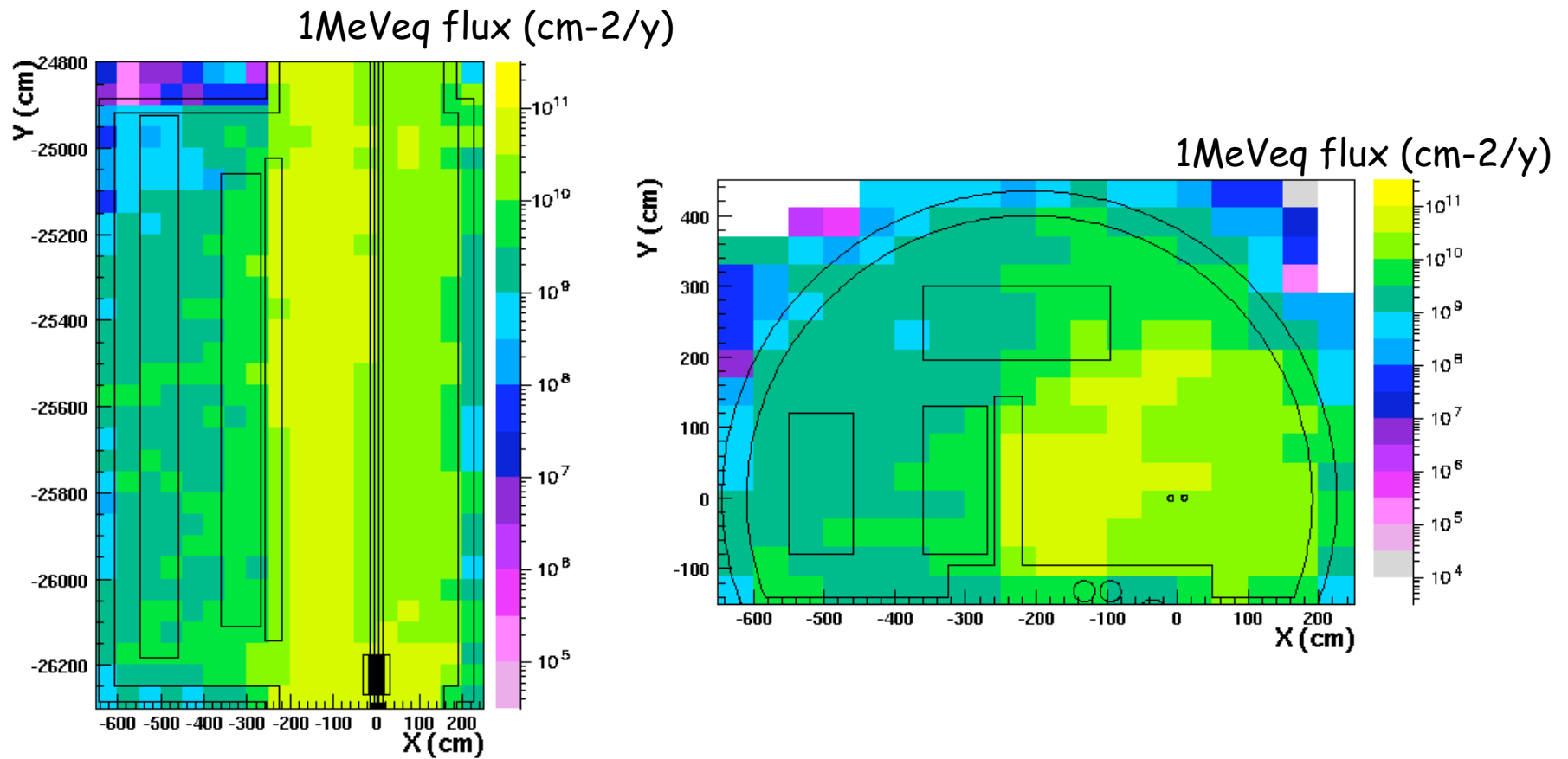
1MeVeq flux ( $\text{cm}^{-2}/\text{y}$ )



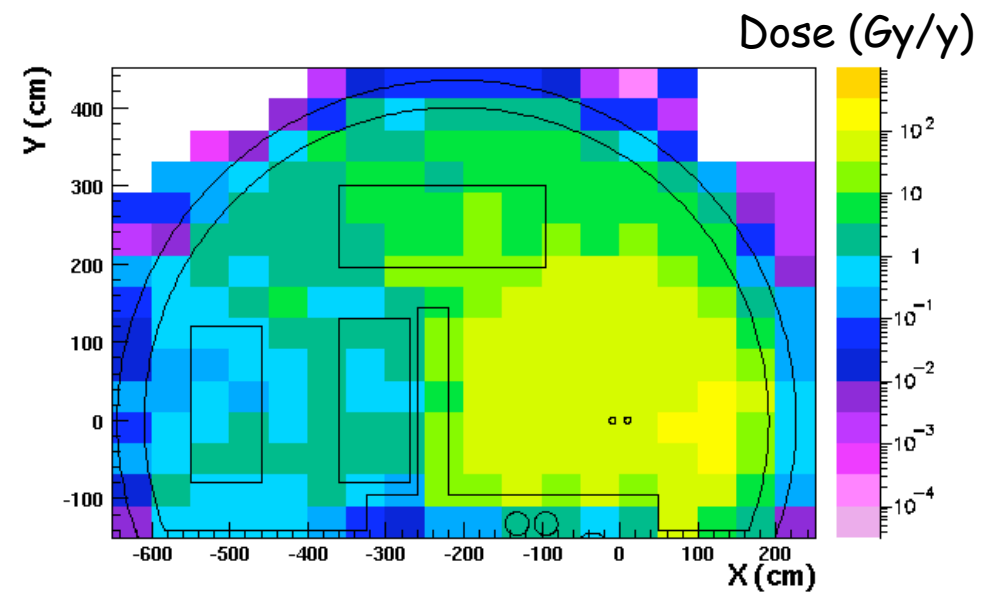
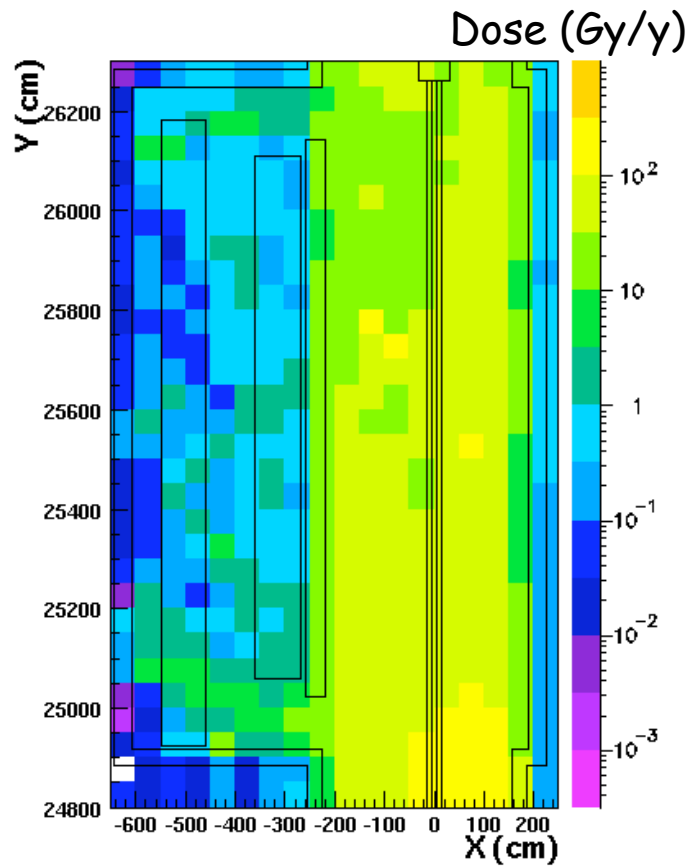
# Dose in RR73 (Gy/year)



# 1MeVeq fluence in RR73 ( $\text{cm}^{-2}/\text{year}$ )

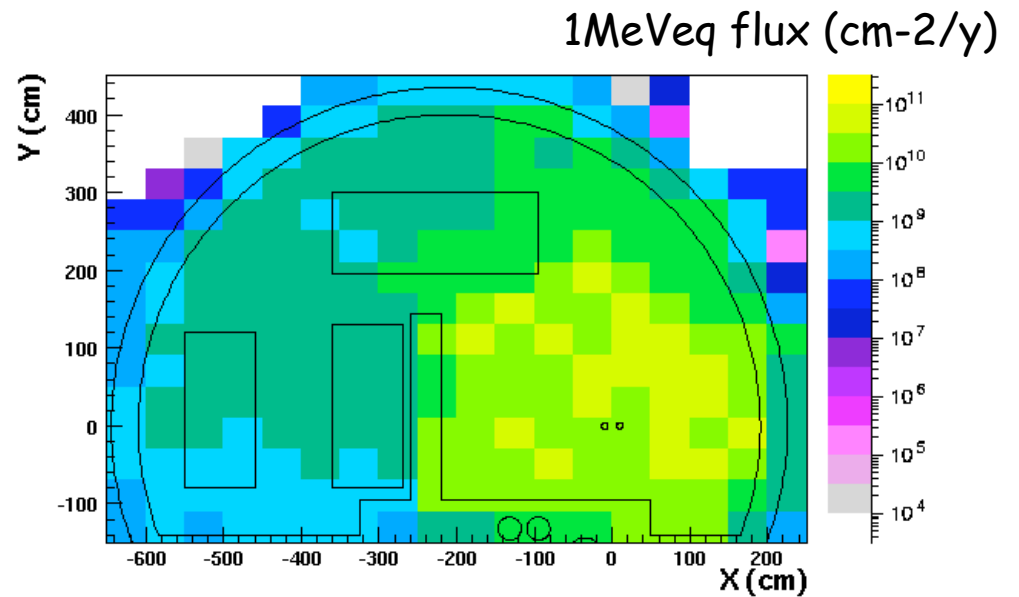
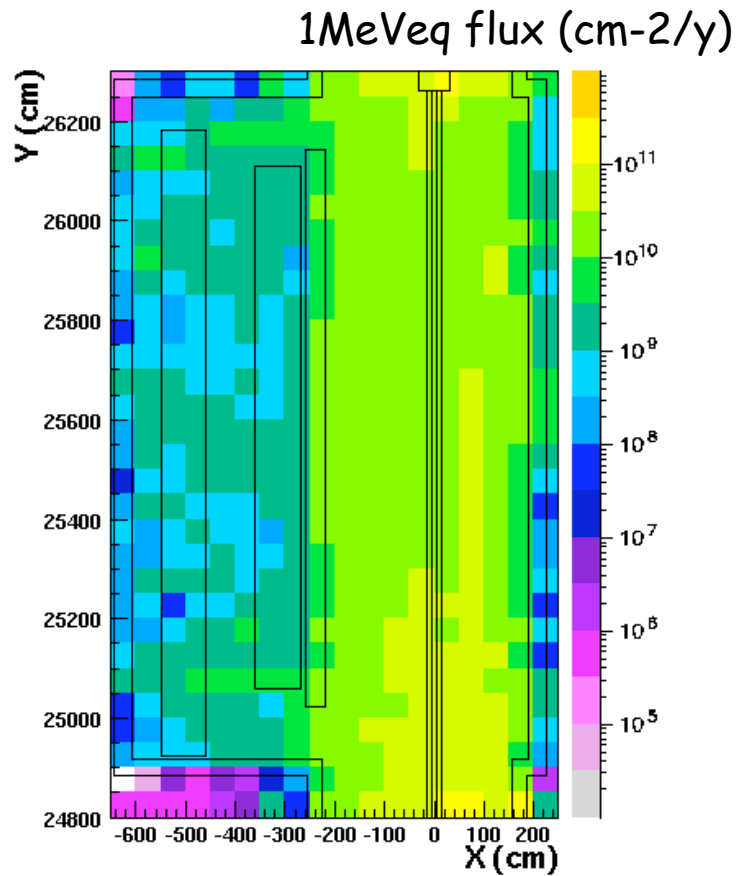


# Dose in RR77 (Gy/year)

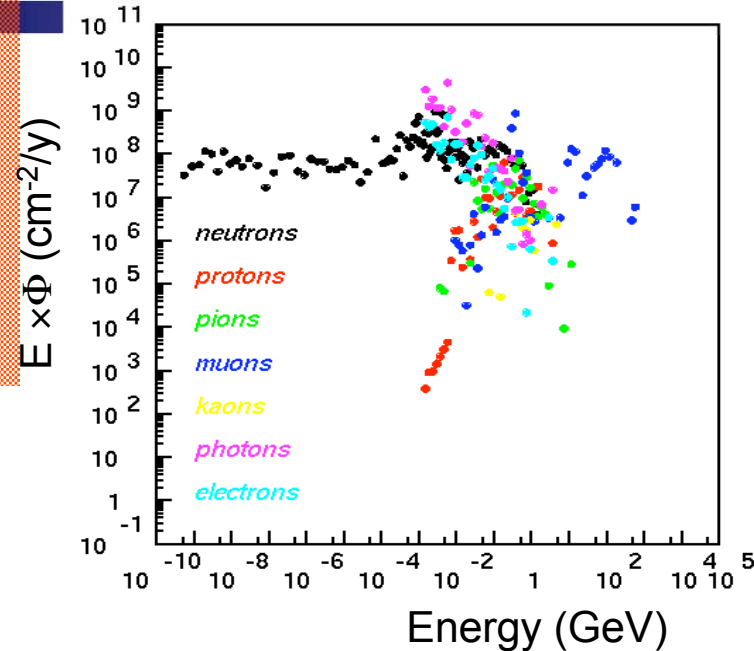




# 1MeVeq fluence in RR77 ( $\text{cm}^{-2}/\text{year}$ )



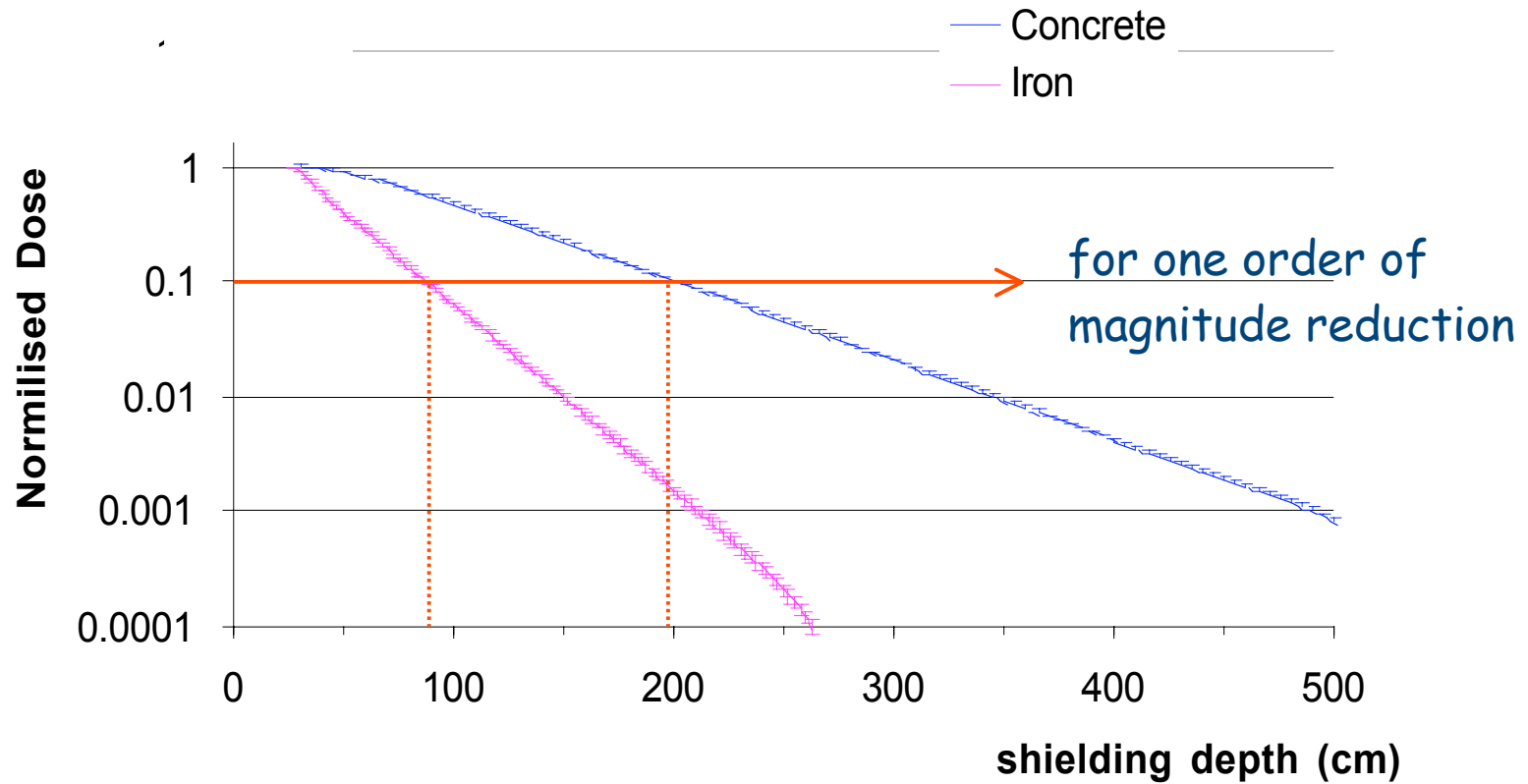
# RR73/77 - Particle Spectra & Mean Particle Flux



~ one order of magnitude  
less radiation in RRs

	Mean values at both levels ( $\text{cm}^{-2}/\text{y}$ )	
	1MeVeq.	Hadrons >20MeV
UJ76	8.5 E+08	3.8 E+08
RR73/77	1.4 E+09	5.1 E+08

# Dose Attenuation



# Fluence Attenuation

