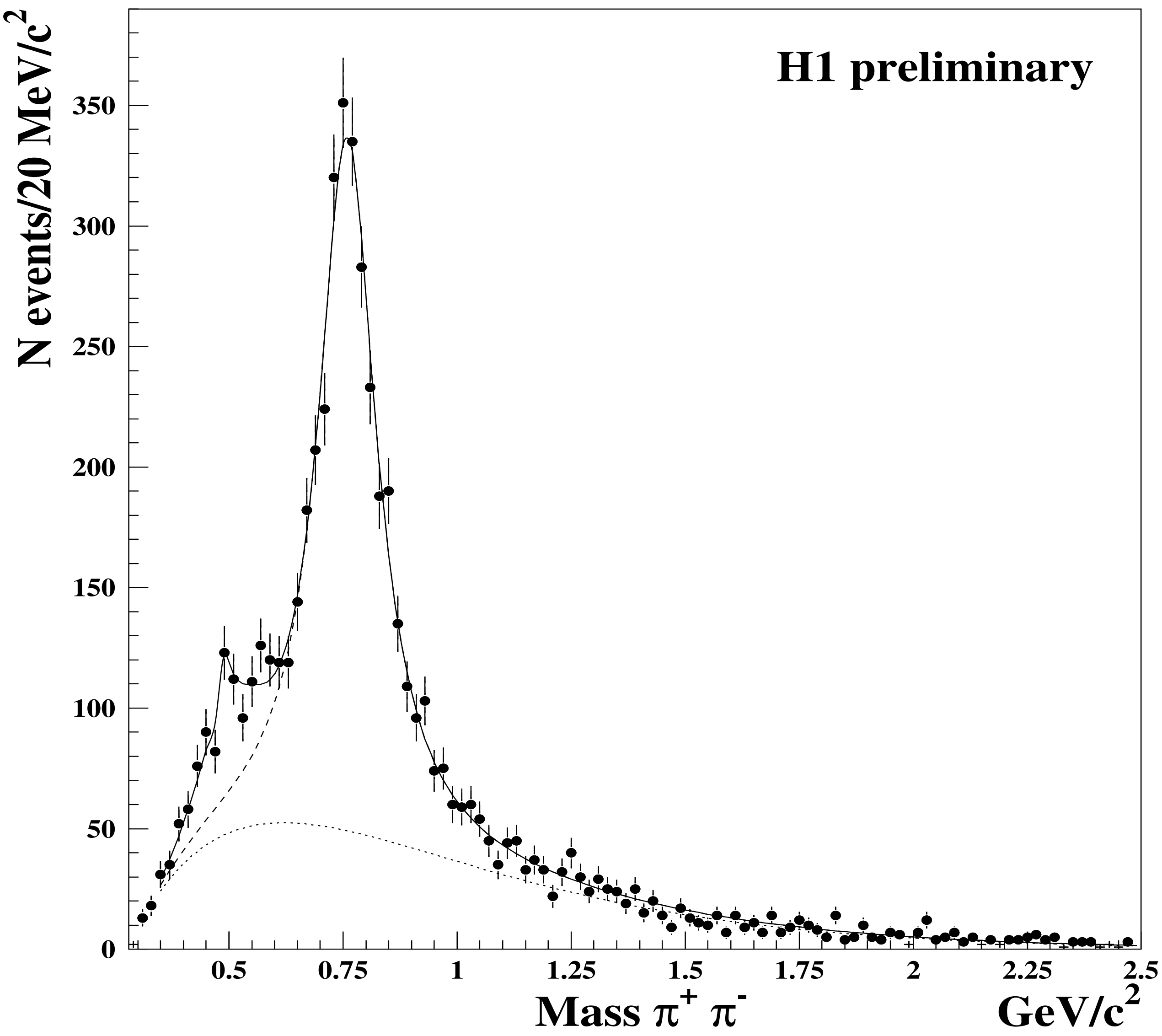
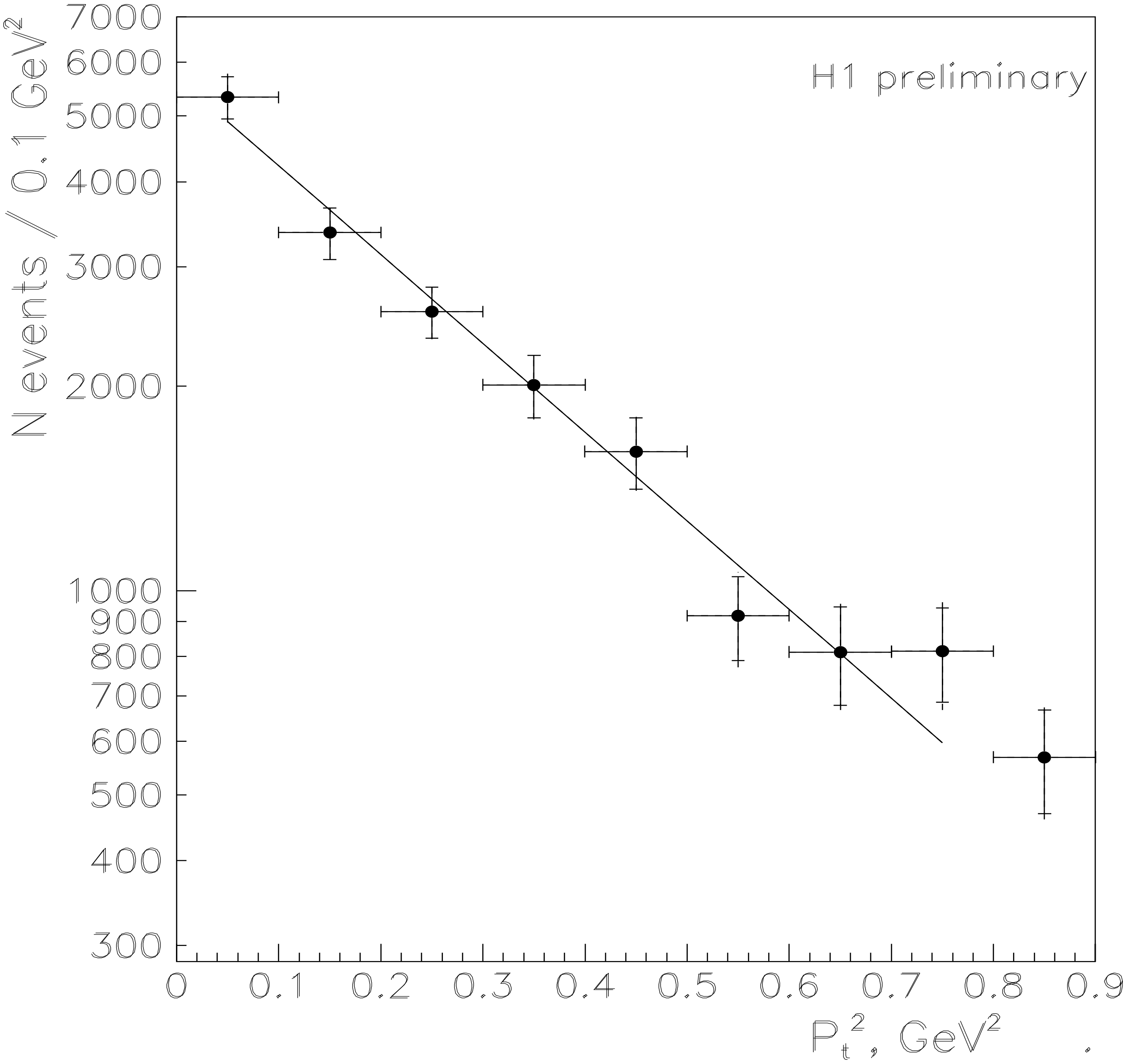
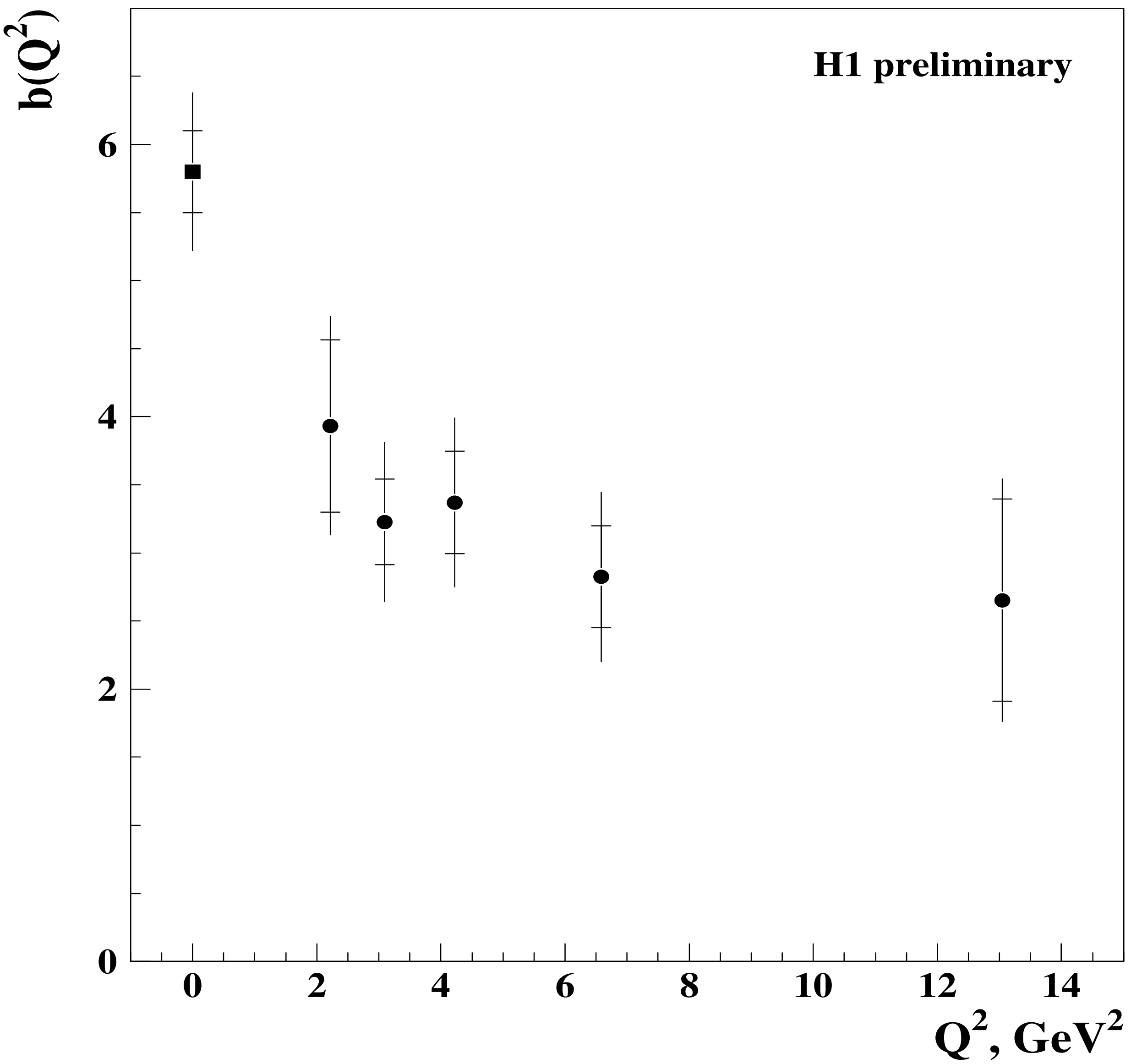


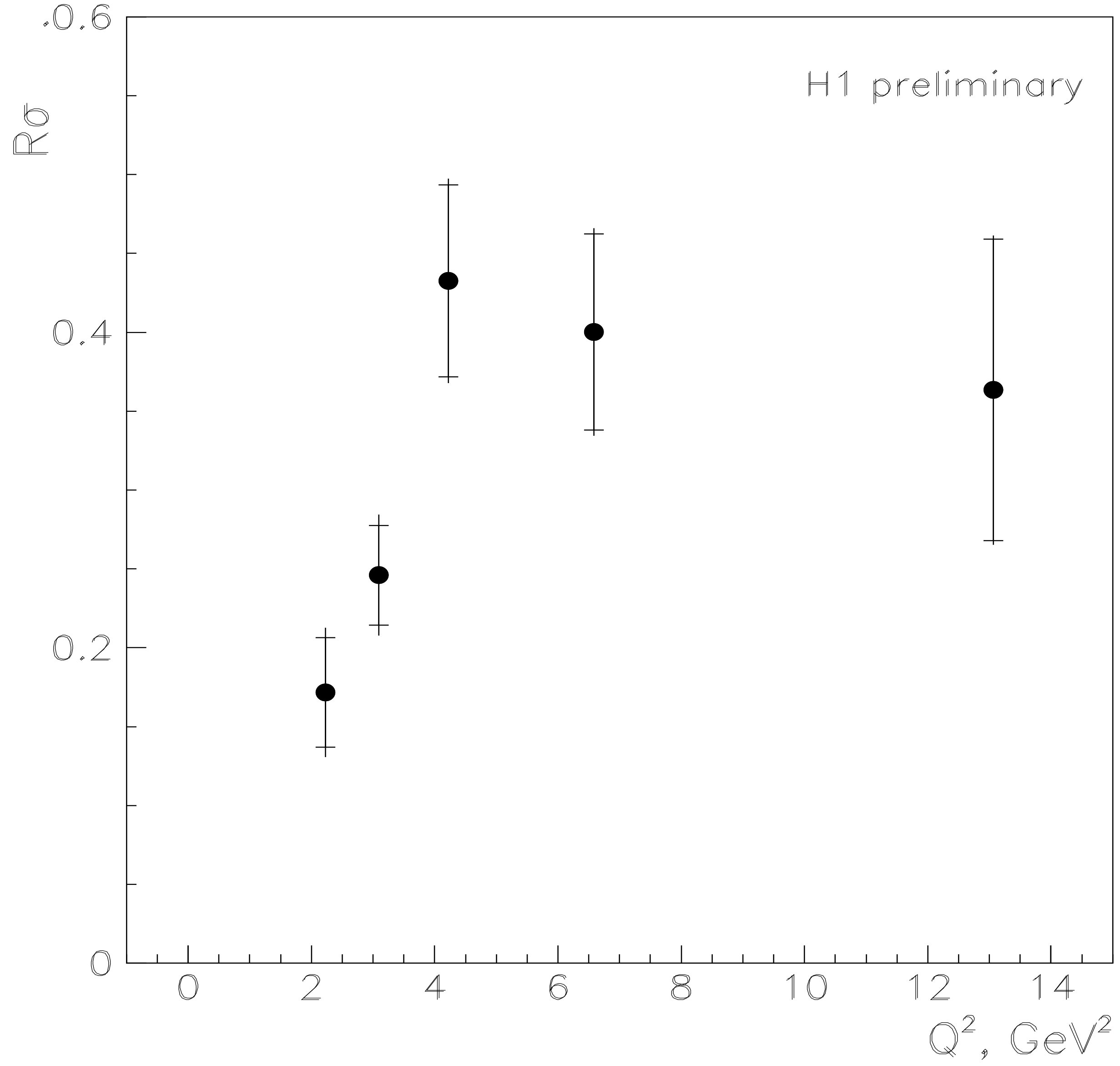
The invariant $\pi^+\pi^-$ mass spectrum for the proton dissociative data sample at the kinematic region $20 < W < 150$ GeV and $1.5 < Q^2 < 30.\text{GeV}^2$. The fit results are presented for the nonresonant background (dotted line), the ω and ϕ backgrounds (dashed line) and the resonant ρ signal (solid line).



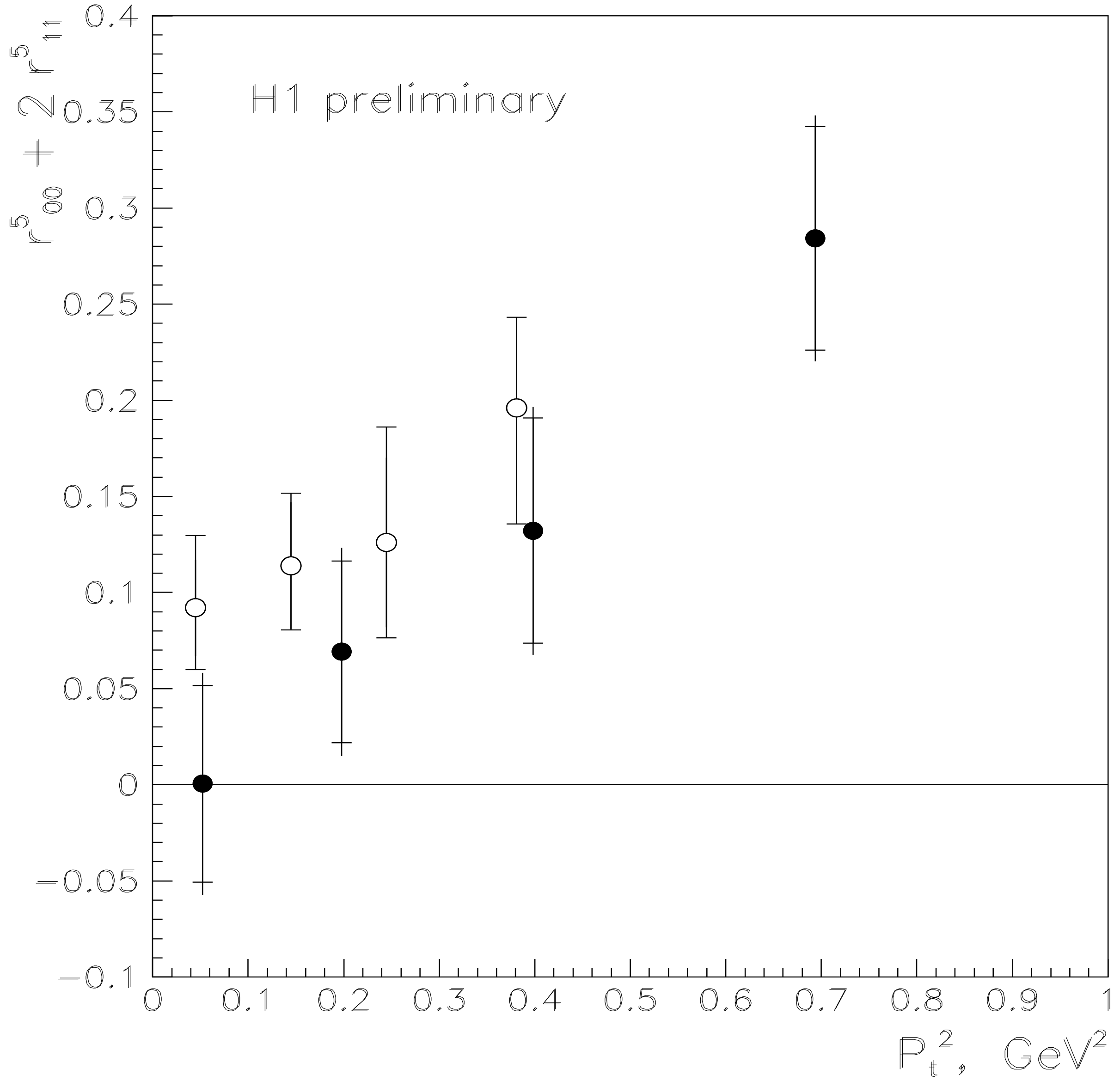
The P_t^2 distribution for the proton dissociative ρ meson electroproduction data sample. The result of the single exponential fit is shown. The obtained b-slope value is b=$2.99 \pm 0.19^{+0.30}_{-0.15}\,\mathrm{GeV}^{-2}$.



The b-slope as the function of Q^2 for the proton dissociative ρ meson electroproduction (full circles, this analysis) and photoproduction (full square, ZEUS 1997).



The ratio R_σ of the differential cross sections for the proton dissociative and elastic processes at $P_t^2 = 0$:
$\mathrm{R}_\sigma = \frac{\mathrm{d}\sigma_{pdis}/\mathrm{d}P_t^2(P_t^2=0)}{\mathrm{d}\sigma_{el}/\mathrm{d}P_t^2(P_t^2=0)}$ as the function of Q^2. The ratio is extracted from a fit of the elastic and proton dissociative differential P_t^2 distributions by the single exponential.



The matrix elements sum $r^5_{00} + 2r^5_{11}$ as the function of P_t^2 for the proton dissociative (full circles, this analysis) and elastic (empty circles, H1 1999) ρ meson electroproduction. This matrix elements combination has to be zero in the case of a S-channel helicity conservation.