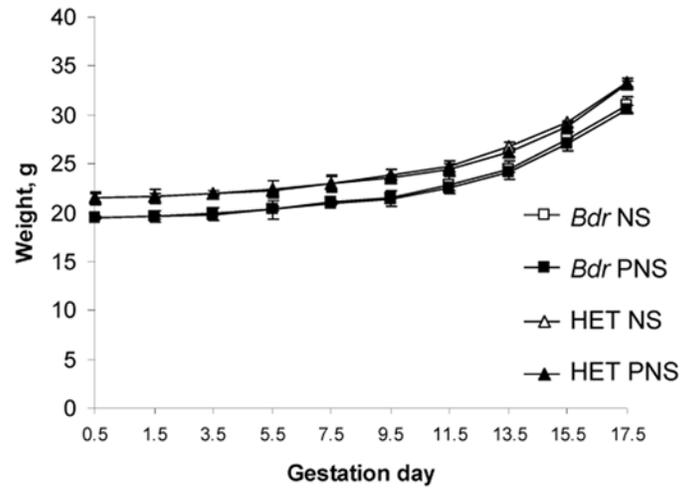


**Supplementary data:**

Male genotype	<i>Bdr</i>		HET	
Stress group	NS	PNS	NS	PNS
Mean litter size	6.1 +/- 1.2	5.9 +/- 1.0	7.8 +/- 1.0	7.6 +/- 1.5
Mean % males	48 +/- 1.6	51 +/- 1.4	46 +/- 2.0	53 +/- 0.9

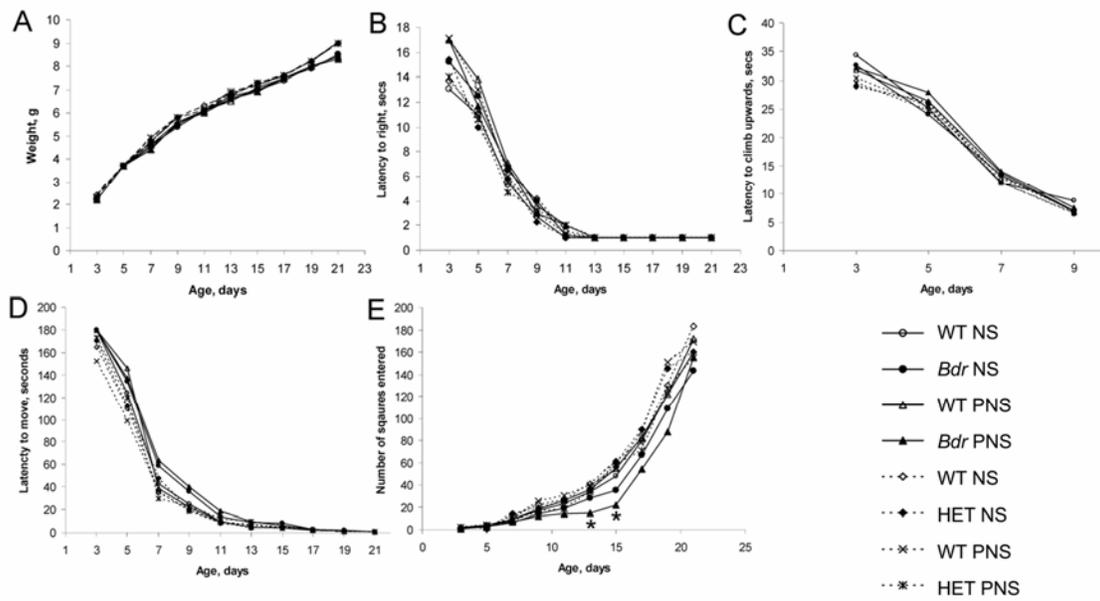
**Table S1:** Post-partum data from all litters used in this study (mean +/- SEM).



**Figure S1: Gestational weight gain.** Apart from background strain differences, PNS had no influence of weight of the dams during pregnancy. Data shown are mean +/- SEM

### *Neonatal development*

Measurements of neonatal development showed that there was no significant difference in weight of *Bdr* or HET mice compared to controls up to P21 regardless of whether the mother was stressed or not. (Figure S2A). In addition, the developmental landmarks of eye opening (day 13) and ear twitch responses (day 11) were not influenced by either genotype or stress (data not shown). Reflex behaviour was measured using the righting response; all *Bdr* and HET pups from both groups were able to right themselves more quickly as postnatal development continued and immediately by P11 (Figure S2B). Negative geotaxis performance also improved from P3 to P9 in all groups and was not influenced by stress (Figure S2C). Measures of walking and exploration were used to examine motor control and movement. *Bdr* mutants tended to be slower to leave the central area of an empty cage after P7 (Figure S2D) and travelled a shorter distance compared to wild-type littermates (Figure S2E). There was a significant effect of stress on the latter parameter, but only at P13 and 15. Taken together, these data show that there were only very minor defects in neonatal development due to the individual stress protocol, although those that were observed did not persist until weaning.



**Figure S2: Neonatal development screen.** *Snap-25* genotype and treatment of the mother (NS or PNS) does not have a significant effect on neonatal growth weight (A), righting reflex (B), negative geotaxis (C), or latency to move in an open field (D). *Bdr* mutants from PNS dams are less active than NS mutants or control wild type (WT) animals at P13 and P15 only (E) ( $*p < 0.05$ ). Mean data are shown.