

Figure 8-figure supplement 1

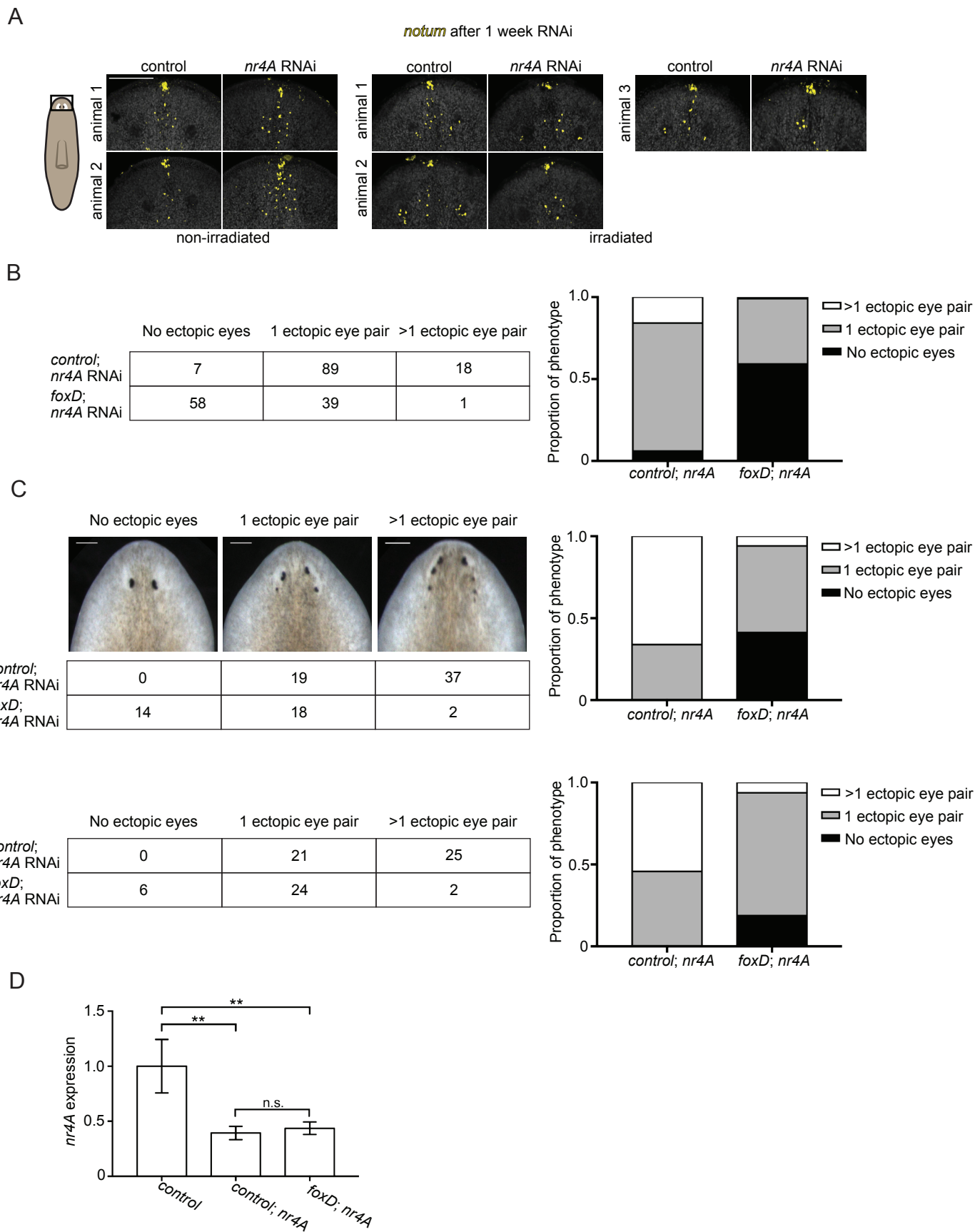


Figure 8-figure supplement 1. Anterior pole shift, a neoblast-dependent process, is important for ectopic eye formation in *nr4A* RNAi. (A) Early anterior pole shift in *nr4A* RNAi is repressed by irradiation. Additional representative images of notum expression by fluorescence *in situ* hybridization in animals fixed 7 days after a single *nr4A* or control RNAi feeding and 8 days after lethal gamma irradiation. Area imaged is indicated by the box in the cartoon on the left. Scale bar represents 100 μ m. (B) Biological replicate of *foxD*; *nr4A* double RNAi in uninjured animals. Table shows numbers of animals seen in each phenotypic category (no ectopic eyes, one ectopic eye pair, and more than one ectopic eye pair) in each of the double RNAi groups (control; *nr4A* and *foxD*; *nr4A* RNAi), with graphic representation on the right. Differences in the number of animals seen in each phenotypic category between control; *nr4A* and *foxD*; *nr4A* RNAi were statistically significant (chi-squared = 74, $p < 0.00001$). (C) *foxD*; *nr4A* double RNAi phenotype scoring in animals with anterior poles excised prior to initiation of *nr4A* RNAi. Representative live images of animals within each phenotypic category are shown. Numbers of animals with each phenotype are tabulated below, with graphic representation of the proportion of each phenotype on the right. Differences in the number of animals seen in each phenotypic category between control; *nr4A* and *foxD*; *nr4A* RNAi were statistically significant (chi-squared = 43, $p < 0.00001$). Scale bars represent 150 μ m. Biological replicate is shown below (chi-squared = 24, $p < 0.00001$). (D) qPCR quantification of *nr4A* expression in control, control; *nr4A*, and *foxD*; *nr4A* RNAi in animals with anterior poles excised prior to initiation of *nr4A* RNAi.