$$\Delta X_i = [10 + (i+1) + rnorm_A] - [10 + i + rnorm_B]$$
$$= (rnorm_A - rnorm_B) + 1$$
$$= \Delta rnorm + 1$$

$$\Delta Y_{1i} = [20 + 2(i+1) + rnorm_A] - [20 + 2i + rnorm_B]$$
$$= 2 + \Delta rnorm$$

$$\Delta Y_{2i} = [20 + 2(i+1) + 5X_{i+1} + rnorm]$$
$$- [20 + 2i + 5X_i + rnorm]$$
$$= 2 + 5\Delta X_i + \Delta rnorm$$