**Analysis of Fishing Methods**Three datasets for three different harvest methods (dipnet, driftnet, and set-net) were examined using this tool. Each contained annual sockeye salmon fishery harvest counts and effort data as reported by the Alaska Department of Fish and Game. From each dataset, a linear regression model (y’=b\_0+b\_1x) was generated and the correlation between the independent variable (effort) and the dependent variable (harvest count) was found for each.

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| **Analysis** | **Estimates** | **Plot** |
| **Dipnet**: Effort to catch rate is highly correlated, with an R^2 of nearly .9.  Model:  b\_0 = -42,904  b\_1 = 14.5631  R^2 = 0.872546  e = 50,629 | x =15,970 -> 189,669  x = 18,692 -> 229,310  x = 6,944 -> 58,222  x = 10,867 -> 115,353  x = 6,263 -> 48,304 |  |
| **Driftnet**: Effort to catch rate is not correlated, with an R^2 of nearly 0.  Model:  b\_0 = 3,547,450  b\_1 = -2,874.96  R^2 = 0.0178436  e = 1,251,300 | x = 628 -> 1,741,970  x = 72 -> 3,340,450  x = 761 -> 13,59,600  x = 223 -> 2,906,330  x = 446 -> 2,265,210 |  |
| **Set-net**: Effort to catch rate is not correlated, with an R^2 of 0.  Model:  b\_0 = 1,991,070  b\_1 = -3,217.54  R^2 = 0.00048  e = 911,065 | x = 535 -> 1,991,070  x = 323 -> 2,673,180  x = 88 -> 3,429300  x = 575 -> 1,862,360  x = 522 -> 2,032890 |  |