Determining High Burden Counties for Overdose Prevention Funding

Scores are assigned to each County based on rates of drug overdose mortality and poverty. Low Scores indicate a higher burden:

County	Score w/o Hosp
LANE	3.217
MULTNOMAH	6.404
DOUGLAS	8.538
LINN	8.987
LINCOLN	9.425
TILLAMOOK	10.11
LAKE	10.78
KLAMATH	11.68
JACKSON	12.14
MALHEUR	12.96
CROOK	13.44
CLATSOP	14.77
BENTON	15.24
COLUMBIA	15.73
MARION	16.38
WASCO	16.6
UMATILLA	17.22
COOS	18.04
DESCHUTES	19.21
BAKER	19.63
YAMHILL	20.6
CLACKAMAS	21.16
UNION	21.71
JEFFERSON	22.45
POLK	22.47
HARNEY	23.67
WASHINGTON	24.24
MORROW	24.65
WHEELER	24.71
JOSEPHINE	25.71
WALLOWA	27.26
GRANT	27.58
HOOD RIVER	27.78
CURRY	28.59
SHERMAN	30.46
GILLIAM	32.46

Four metrics were used:

- Rate of meth overdose related death
- Rate of heroin overdose related death

- Rate of prescription opioid related death
- Percentage of county population living in poverty

The rates of overdose death are weighted by the statewide frequency of each type of event. The weights given to each type of overdose death are:

Prescription Opioids	0.213508
Methamphetamine	0.461874
Heroin	0.324619

All metrics are based on a 5-year average. Hospitalization data was omitted from the scoring algorithm due to the suppression of low counts in less populous counties. Different disclosure rules apply to the death data. Zero rates in the calculation are true 0s. In this way there is no ambiguity about the county ranks.

The formula for the score is:

$$
\begin{aligned}
\text{County Score} = \ &0.75 * (meth\_weight*meth\_death\_rank \ + \\
&\qquad heroin\_weight*heroin\_death\_rank \ + \\
&\qquad rxopioid\_weight*rxopioid\_death\_rank) \ + \\
&0.25 * County\_poverty\_rank
\end{aligned}
$$