EXAM 2 PRACTICE PROBLEMS

PUBPOL 2130 / INFO 3130
MOON DUCHIN, SPRING 2025

As before, the expectation is that you will spend five minutes on each question, and the whole test will have 7-8 questions.

From notebooks.

(1) In the weapons flow notebook, what is this dictionary for?

```
{
    "Biafra": ("Enugu", 7.5139, 6.4483),  # 1967 capital (now part of Nigeria)
    "Bosnia-Herzegovina": ("Sarajevo", 18.4131, 43.8563),
    "South Yemen": ("Aden", 45.0176, 12.7906),
    "Katanga": ("Lubumbashi", 27.5026, -11.6876),
    "South Sudan": ("Juba",  31.5825, 4.8539),
    "Palestine": ("East Jerusalem", 35.217018, 31.771959),
    "Aruba": ("Oranjestad", -70.0353, 12.5227),
}
```

(2) Braintree Precinct 5B has CVAP 1961.845304 in the `ma_ward_precinct_gdf` that we built in the elections notebook. But CVAP stands for citizen voting age population — how come it is not a whole number?

(3) Annotate/explain this code.

```
net_migration_graph = nx.DiGraph()

for a_county, a_county_fips in nyc_county_fips_codes.items():
    for b_county, b_county_fips in nyc_county_fips_codes.items():
        if a_county == b_county:
            continue

        flow = flow_df.loc[(a_county_fips, b_county_fips)]
        net_flow = flow["net_flow_est"]
        if net_flow >= 0:
            net_migration_graph.add_edge(
                a_county,
                b_county,
                weight=net_flow,
            )
        else:
            net_migration_graph.add_edge(
                b_county,
                a_county,
                weight=-net_flow,
            )
```

From readings and lectures.

WEAPONS
What is TIV and why is it useful for the study of the arms trade?

ELECTIONS
In Rodden's interview, he says "And so what my argument is about is that these places that are voting, you know, 85, 90% for the Democrats tend to be places like downtown Cleveland, where there's no manufacturing to speak of any more." What are some of the theories discussed by Rodden and Roberts (the interviewer) about why former industrial areas are currently left-leaning?

MIGRATION
Moretti writes that "In 2009, at the peak of the Great Recession, unemployment in Detroit reached 20 percent, while unemployment in Iowa City, about 500 miles west of Detroit, was only 4 percent." What factors does he diagnose that might predict whether someone moves from Detroit to Iowa City to seek a job? What related policy intervention does he propose?

ORGANS
What are some elements that Kieran Healy identifies as downsides or limitations of using market/financial incentives to improve the availability of kidneys and blood for medical use?

TRANSIT
How is mandating minimum parking requirements like treating sick people with lead?