Prescription Drug Misuse in Europe: Past, Present, Future
Today’s Goals

- Comparing data between European countries with the Survey of Nonmedical Use of Prescription Drugs (NMURx)
- European trends in prescription misuse by class
- European trends in prescription misuse by active pharmaceutical ingredient
What is the RADARS® System?

- Supported by subscriptions from pharmaceutical manufacturers, government, and non-government agencies for surveillance, research and reporting services
- Property of Denver Health and Hospital Authority, a political subdivision of the State of Colorado
- Denver Health retains exclusive ownership of all data, databases and systems. Subscribers do not participate in data collection nor do they have access to the raw data.
The Global Mosaic of Nonmedical Use: High Level Overview

• Survey of Nonmedical Use of Prescription Drugs
  • Standardized survey in multiple countries
  • Allows direct cross-country comparisons
  • Each country has a “fingerprint” of patterns of nonmedical use
• Prevalence by class of drug
• Gives an idea of country-by-country trends
Survey of Non-Medical Use of Rx Drugs (NMURx) Coverage

- UK: 3Q14
- Singapore: 3Q15
- US, Canada: 3Q16
- France, Italy: 2Q17
- Germany, Spain: 4Q17

Methodology optimization projects in 2018
Survey of Non-Medical Use of Prescription Drugs (NMURx)

- An online, cross-sectional survey that assesses prescription and illicit drug use in the general adult population
- 10,000 - 30,000 unique individuals twice annually
- Data presented today from 2018
  - Canada
  - Germany
  - Italy
  - Spain
  - UK
Survey of Non-Medical Use of Prescription Drugs (NMURx)

• **Misuse**: Use of a medication in a way not prescribed by a doctor
  • Includes using more pills, more often, or without a prescription

• **Abuse**: Use of a medication to get high or for the feeling it causes
Prescription Stimulant Nonmedical Use

<table>
<thead>
<tr>
<th>Country</th>
<th>Stimulant NMU</th>
<th>Stimulant Abuse</th>
</tr>
</thead>
<tbody>
<tr>
<td>Canada</td>
<td>1671</td>
<td>623</td>
</tr>
<tr>
<td>Germany</td>
<td>991</td>
<td>477</td>
</tr>
<tr>
<td>Italy</td>
<td>570</td>
<td>212</td>
</tr>
<tr>
<td>Spain</td>
<td>1212</td>
<td>496</td>
</tr>
<tr>
<td>UK</td>
<td>1427</td>
<td>773</td>
</tr>
</tbody>
</table>
Prescription Sedative Nonmedical Use

Weighted Estimate per 100,000 Population

- Canada: 4144 Sedative NMU, 1184 Sedative Abuse
- Germany: 2979 Sedative NMU, 556 Sedative Abuse
- Italy: 4524 Sedative NMU, 694 Sedative Abuse
- Spain: 10276 Sedative NMU, 878 Sedative Abuse
- UK: 3490 Sedative NMU, 1105 Sedative Abuse

RADARS SYSTEM
Prescription GABA Nonmedical Use

- Canada: 1219
- Germany: 845
- Italy: 708
- Spain: 917
- UK: 997

Weighted Estimate per 100,000 Population

GABA NMU
GABA Abuse
The Global Mosaic of Nonmedical Use: Zooming In

- Can zoom in within NMURx data for more detail:
  - By product
  - By geography
  - By behavior

- Focusing on opioid active ingredients by country
Prescription Opioid Nonmedical Use by Active Ingredient

[Bar chart showing weighted estimates per 100,000 population for Canada, Germany, Italy, Spain, and UK. Each country has bars for different opioids: Buprenorphine, Codeine, Hydromorphone, Morphine, Oxycodone, and Tramadol.]
The Global Mosaic of Nonmedical Use: Conclusions

- Detailed data within each country provides more clear patterns of use and opportunities for intervention
- Patterns of nonmedical use differ by country
  - Opioids and sedatives highest in Spain
  - Stimulants and GABA drugs highest in UK
- Nonmedical use high for codeine, tramadol
  - Abuse also seen with morphine