

An aerial photograph showing a large wildfire burning in a valley. Thick, white and grey smoke billows upwards from the fire, partially obscuring the landscape below. In the background, there are rolling green hills and mountains under a clear sky. The foreground shows a road and some buildings near the fire's edge.

# **Future of Health Science: The Role of Smoke Forecasting**

**October 10, 2014**

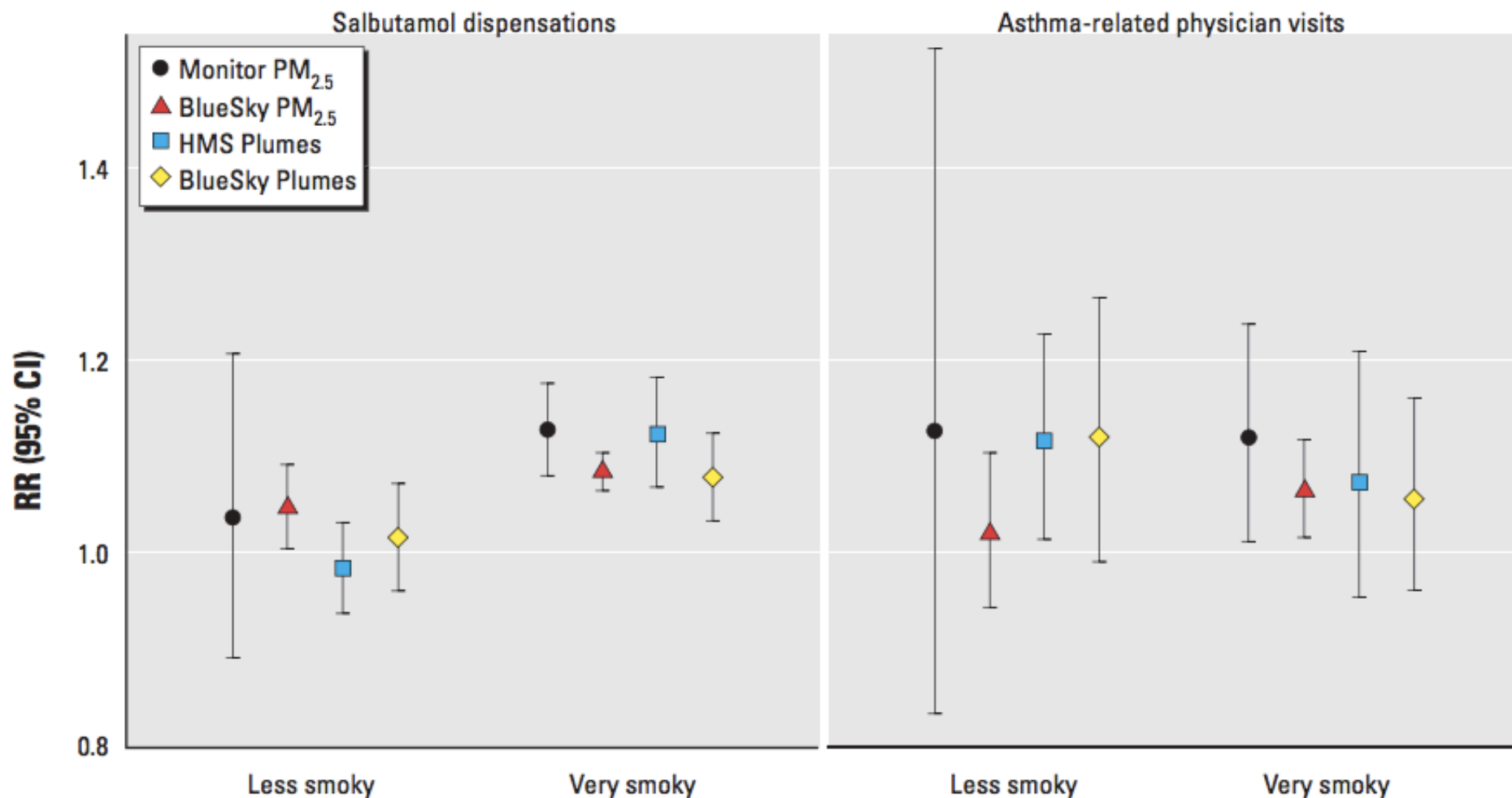
**Sarah Henderson**

**BC Centre for Disease Control**

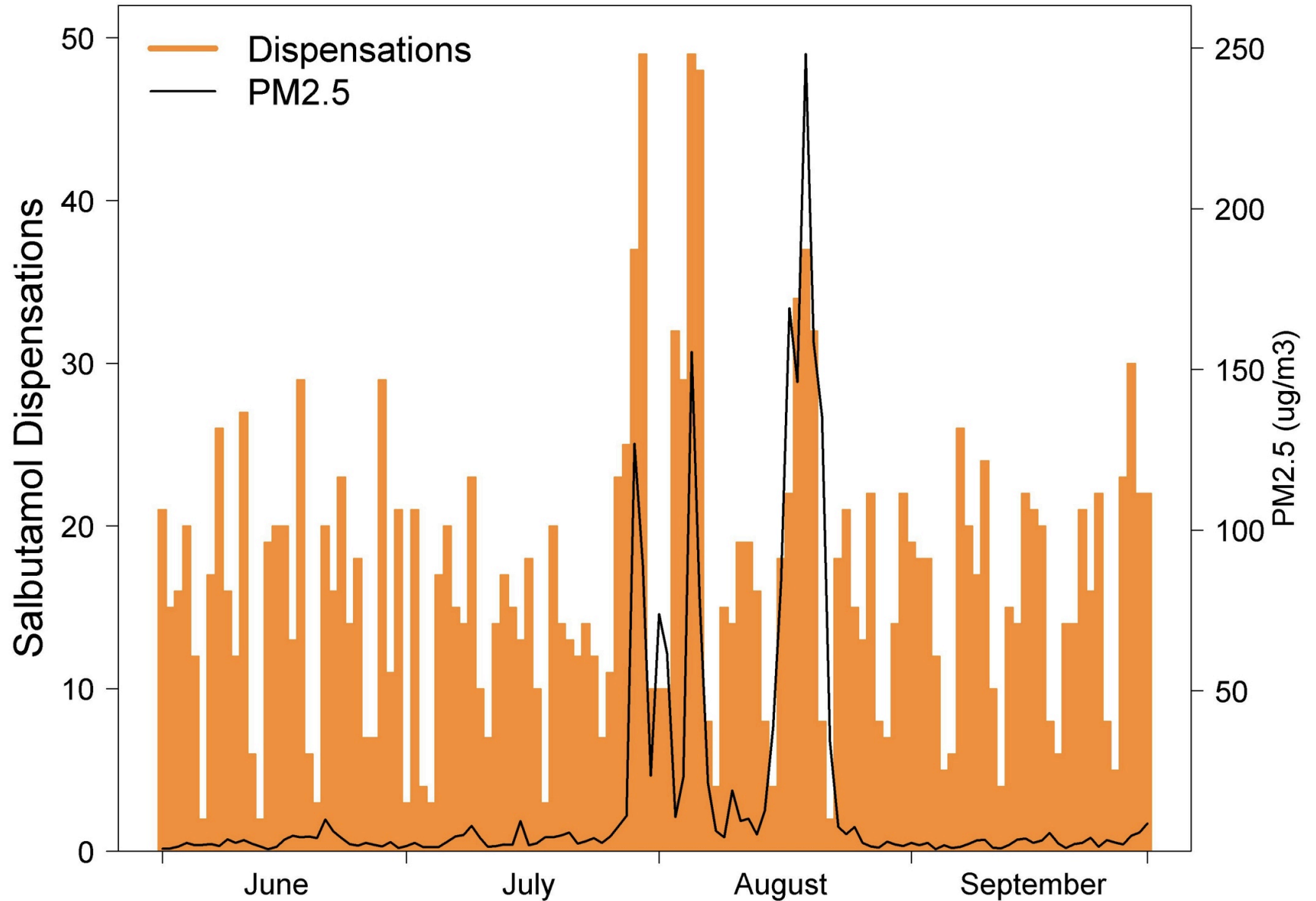
# Questions:

1. Acute vs. chronic effects
2. Public health protection
3. Very short-term exposures
4. Pollutant mixtures
5. Smoke age
6. Smoke type

# Effects of **forecasted** smoke consistent with effects of **observed** smoke for asthma outcomes



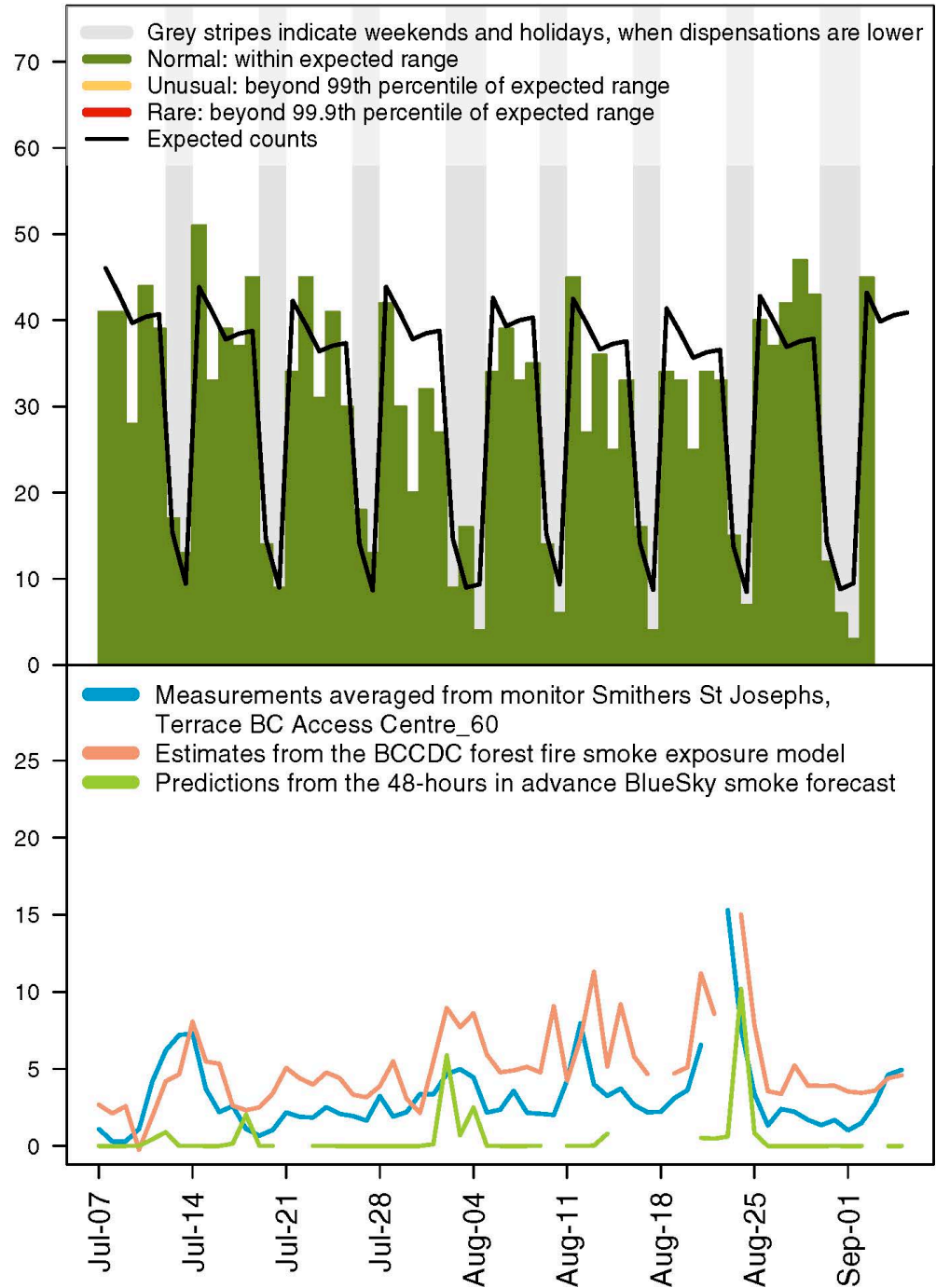
# Salbutamol Dispensations 2010



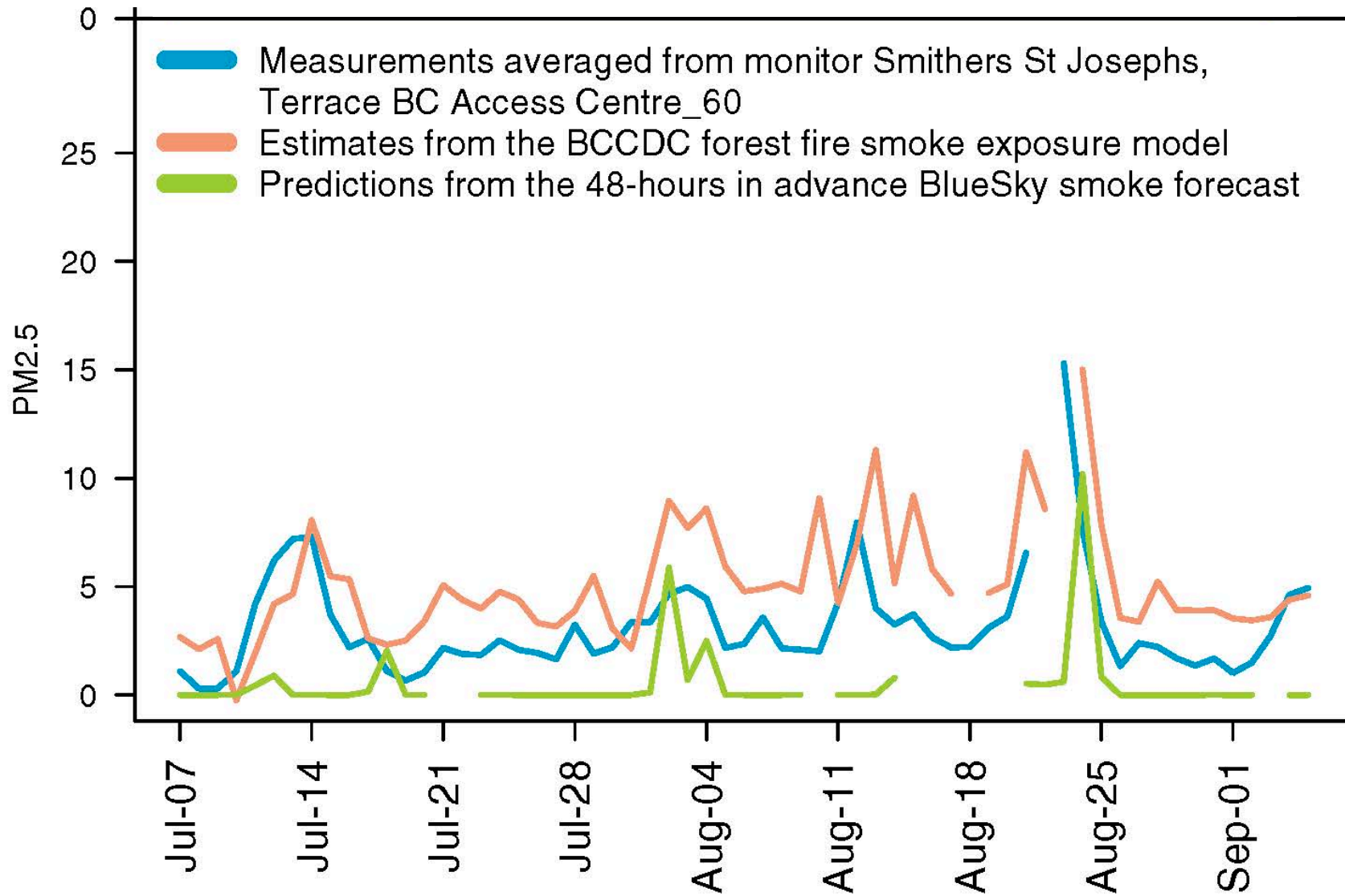
And then  
some **MAGIC**  
happened...



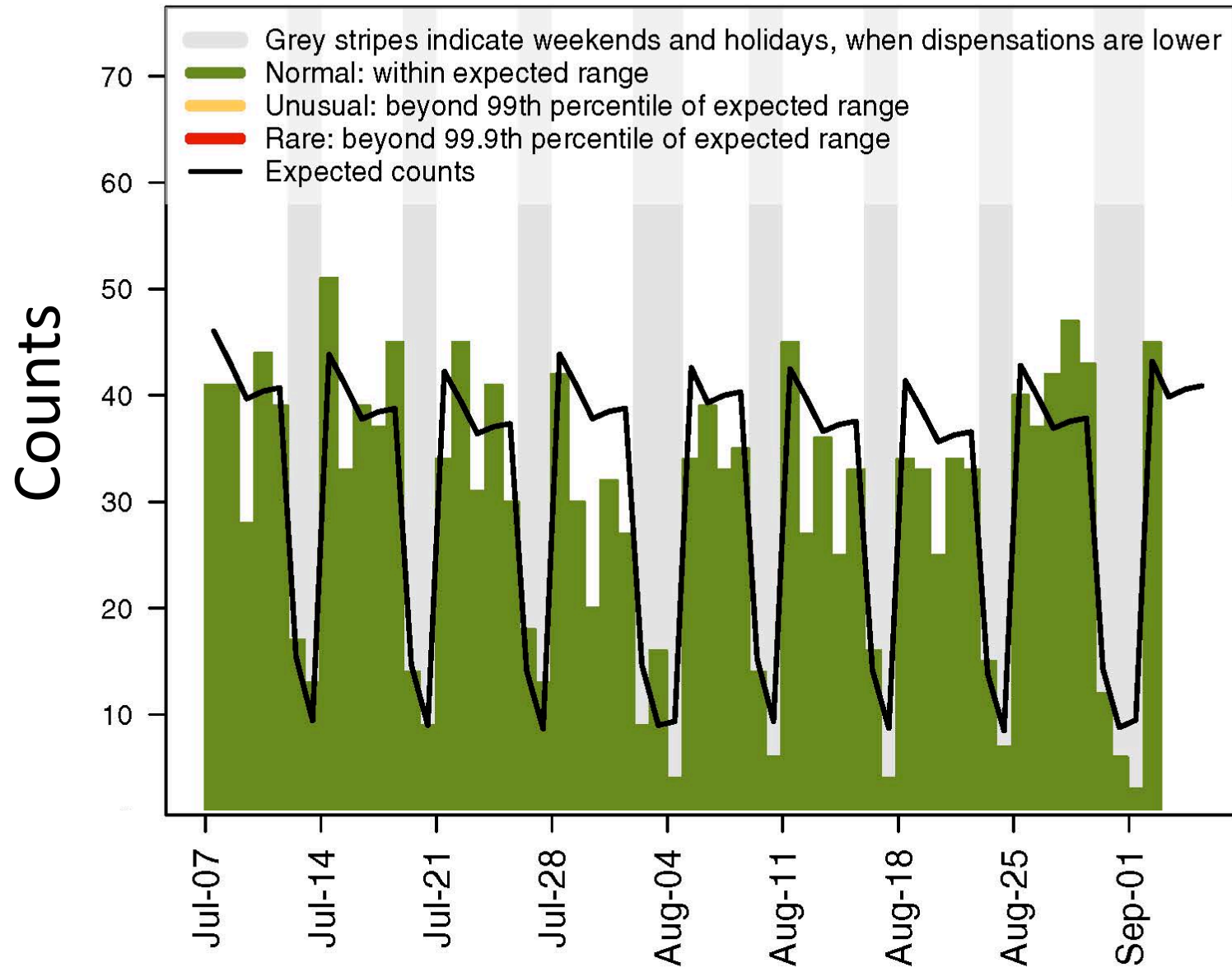
# BC Asthma Monitoring System (BCAMS)



# Exposure Metrics

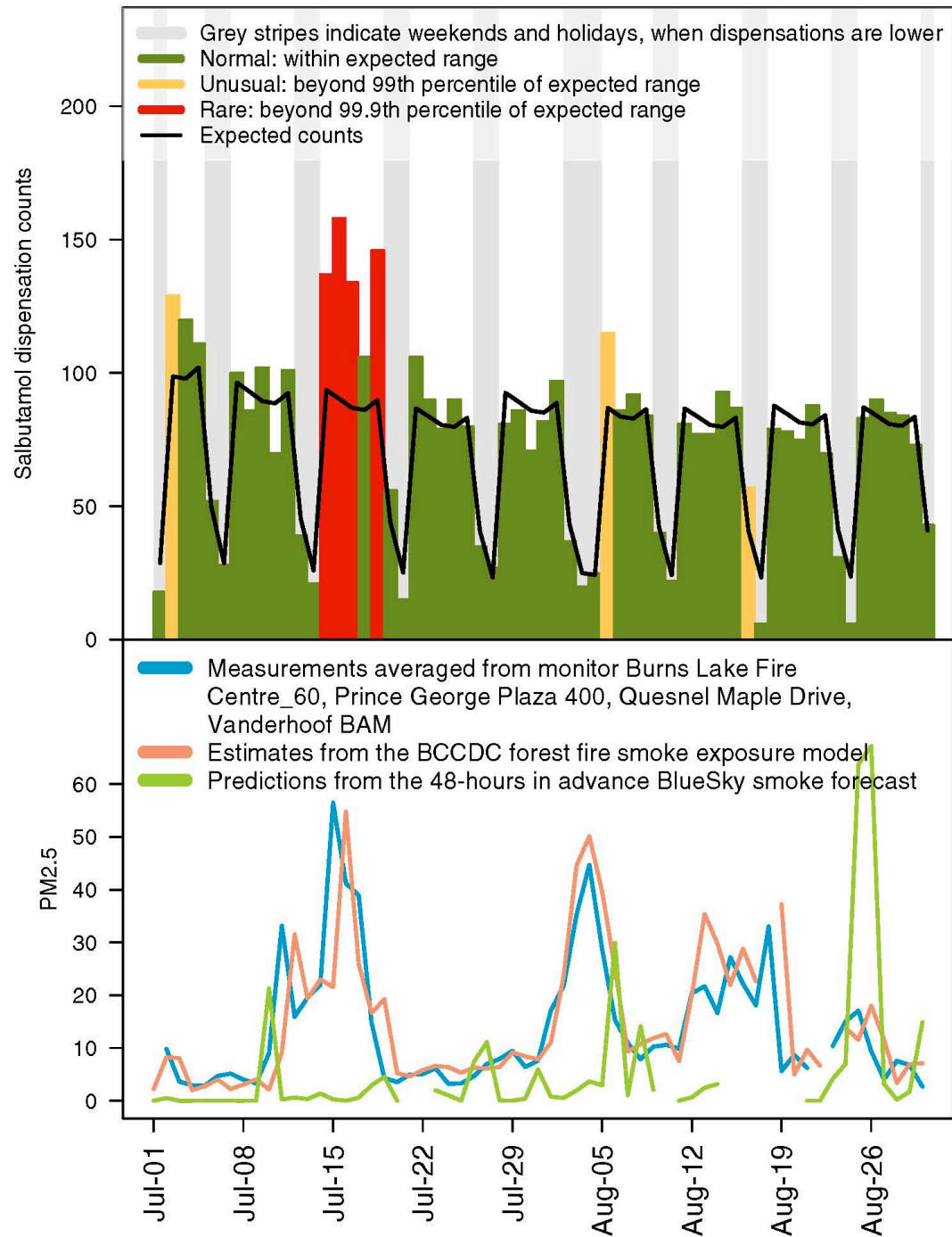


# Outcome Counts

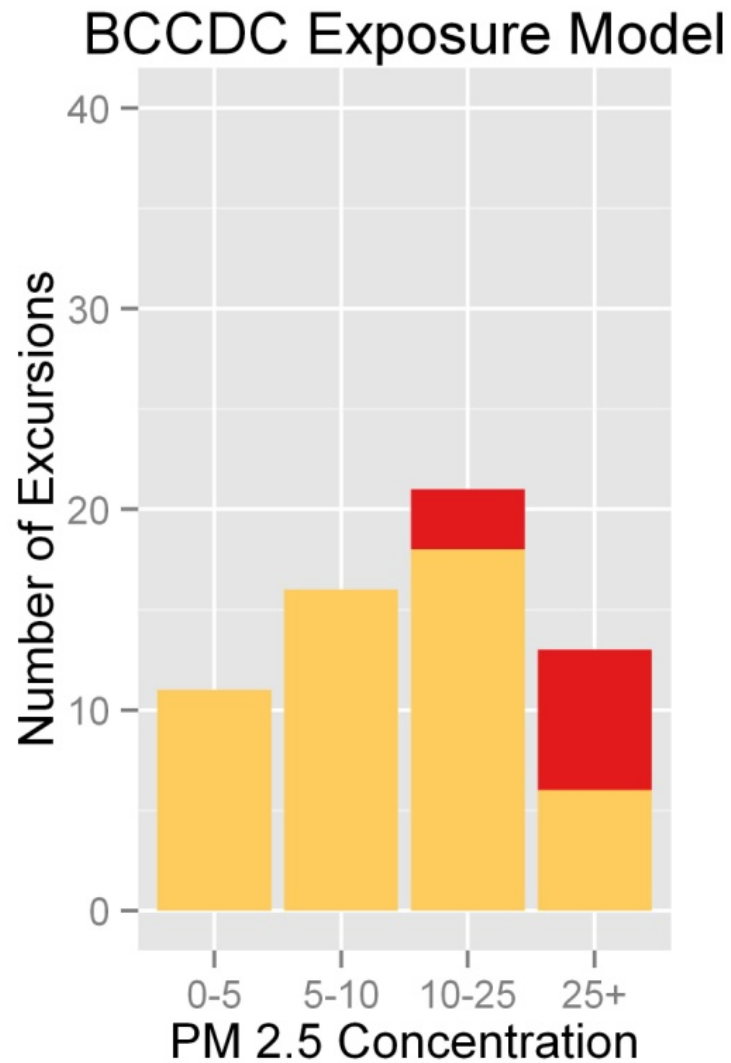
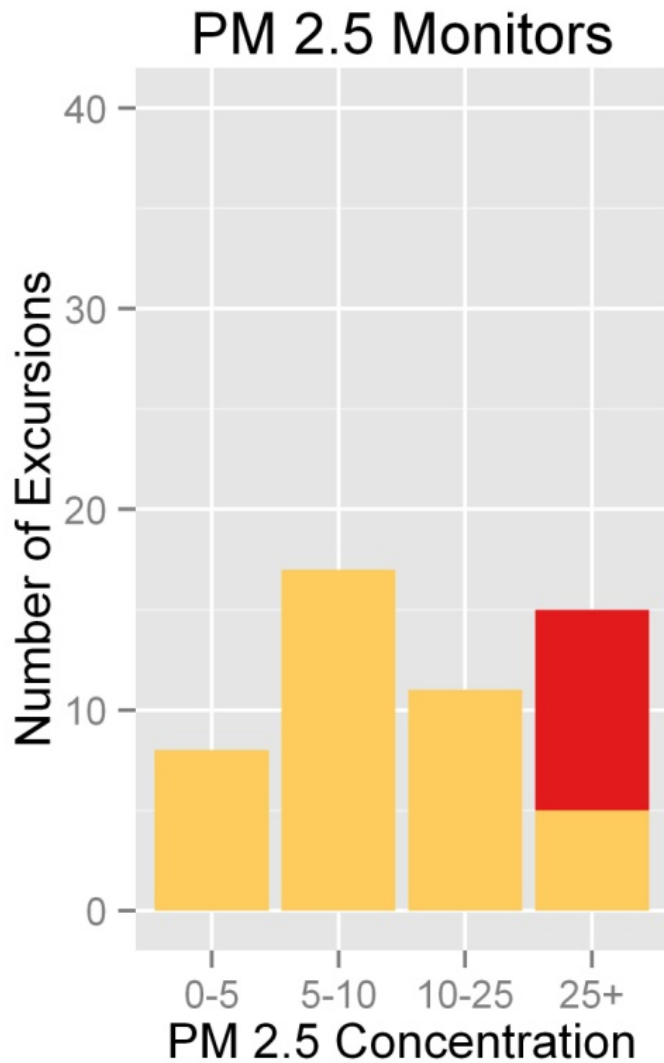




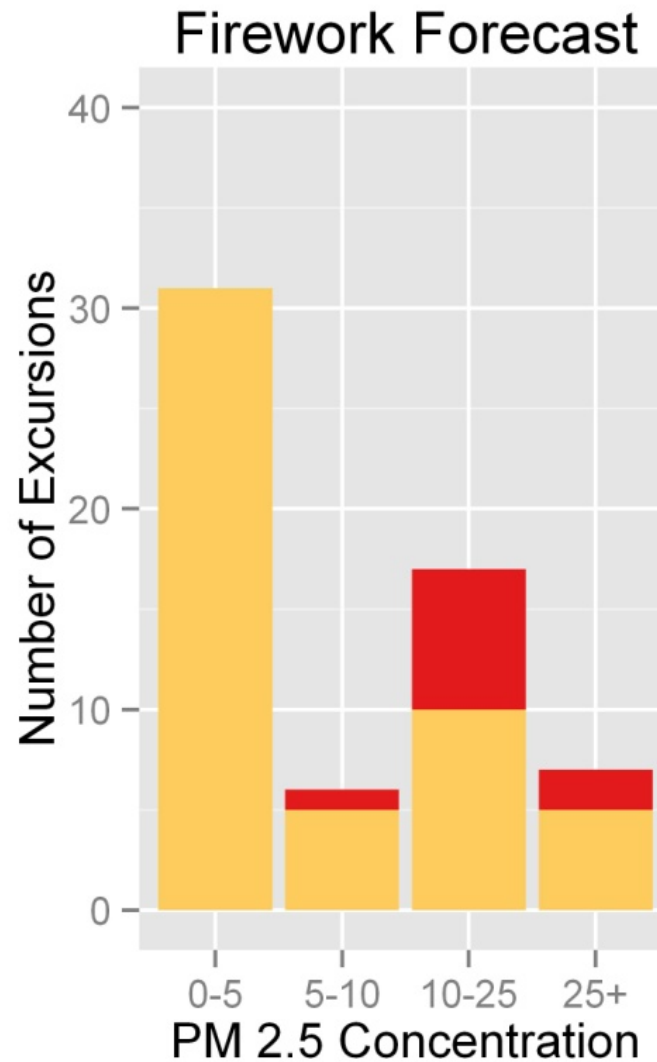
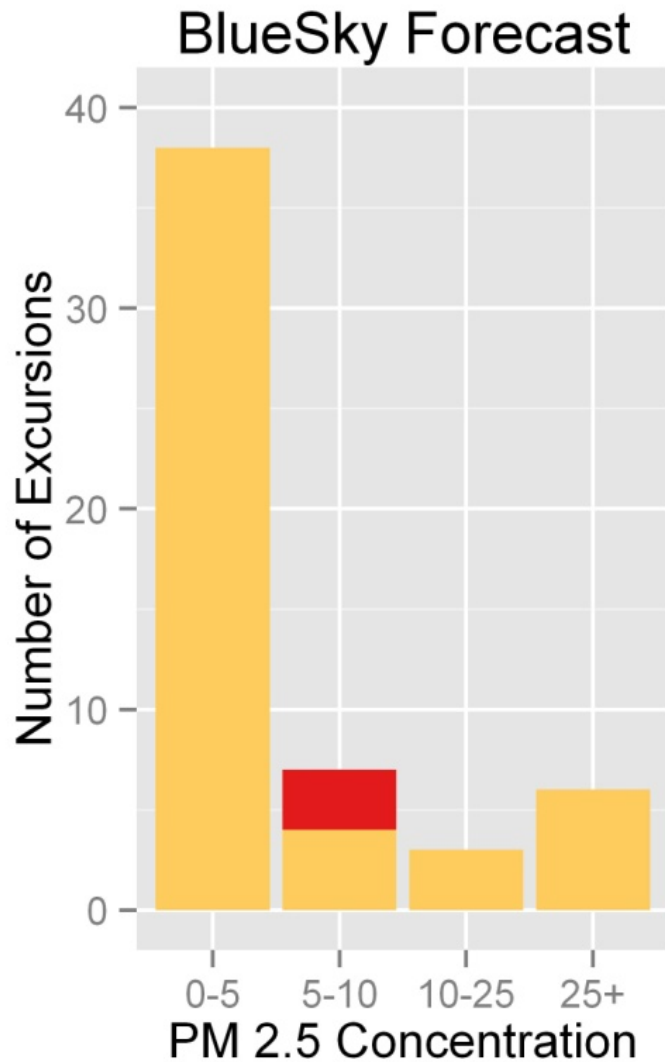
# Northern Interior Summer 2014



# Excursions



# PharmaNet Excursions



# Remaining questions:

1. Acute vs. chronic effects
2. Public health protection
3. Very short-term exposures
4. Pollutant mixtures
5. Smoke age
6. Smoke type