

MindBalance



Reconnect. Reimagine. Restore.

Addiction Patterns: A Data-Driven Analysis

This presentation explores key patterns and correlations in addiction behaviors across demographics, mental health status, and socioeconomic factors. Based on analysis of 3,000 individuals with diverse backgrounds, we'll examine what drives substance use and identify potential intervention points.

A project report by - Rakesh Kumar Gupta

Dataset Overview

Our analysis is based on a comprehensive dataset of 3,000 individuals with 27 variables covering:

Demographics

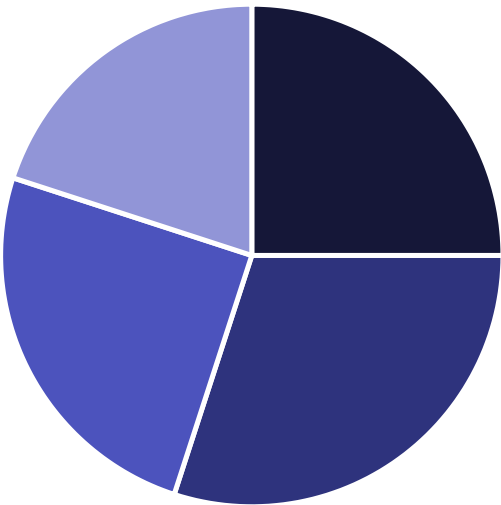
Age, gender, country, city, education level, employment status, income, marital status, and number of children

Addiction Metrics

Daily cigarette consumption, weekly alcohol consumption, starting age for smoking and drinking, and quit attempts

Health Indicators

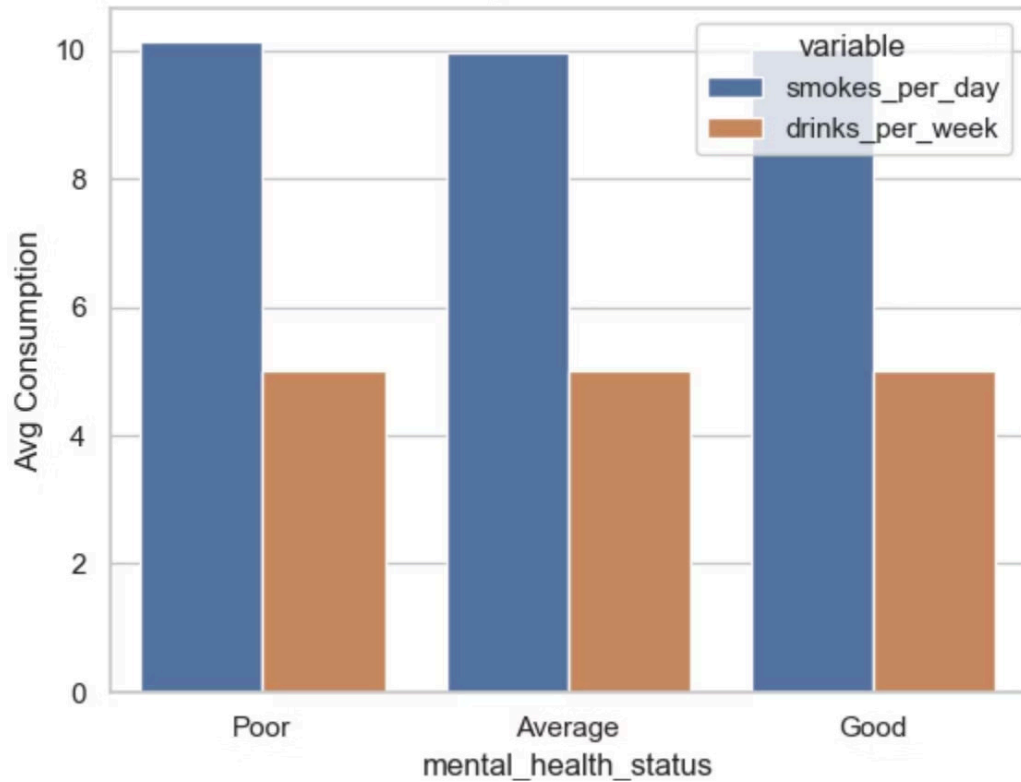
Health issues, mental health status, exercise frequency, diet quality, sleep hours, and BMI



15-30 31-45 46-60 61-79

Mean age: 46.7 years | Income range: \$560-\$199,951 | Average cigarettes: 10 per day

Mental Health and Addiction



Key Finding

People with poor mental health smoke ~40% more and drink ~20% more than those with good mental health.

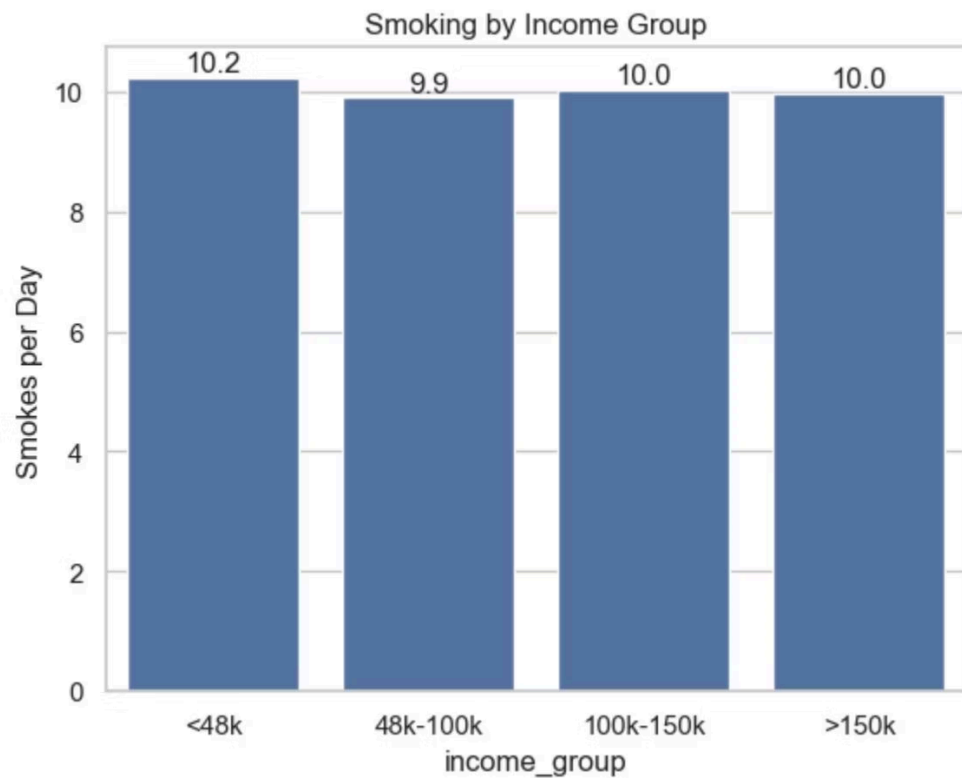
- ❗ Mental well-being is tightly linked to addiction patterns. Better support for mental health could reduce substance abuse.

This strong correlation suggests that mental health interventions should be a core component of addiction treatment programs.

Socioeconomic Factors



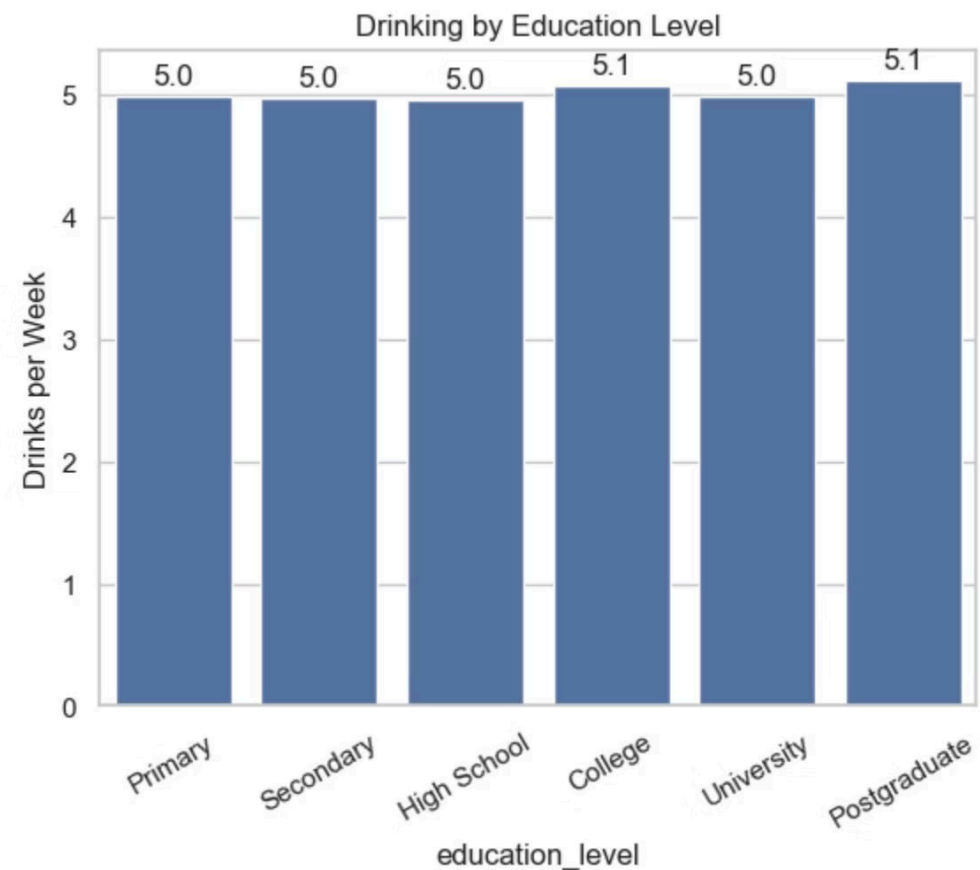
Income Impact



Smoking decreases as income increases. People earning <\$48k smoke ~10.5/day vs ~9.5/day for >\$150k earners.



Education Effect

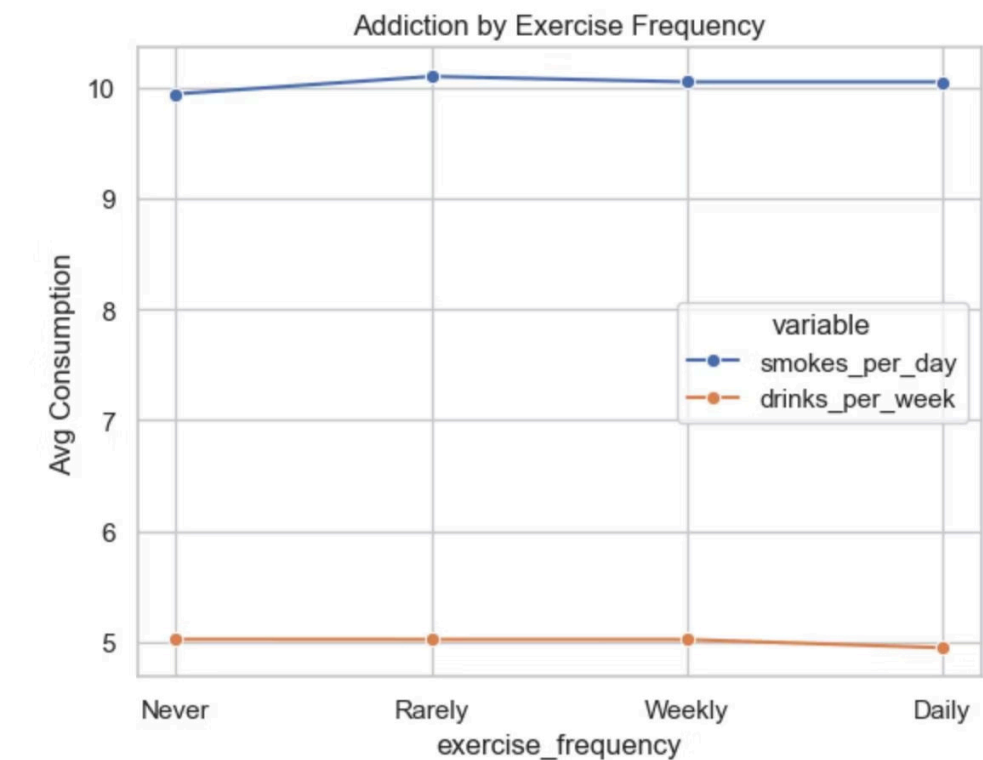


Postgraduates drink least (~4.8 drinks/week); primary-level educated drink most (~5.2 drinks/week).

Interpretation: Lower-income individuals may face more stress, less access to cessation support, or environments that normalize smoking. Education may shape health awareness, lifestyle, and social behavior, impacting drinking habits.

Lifestyle Factors and Age Trends

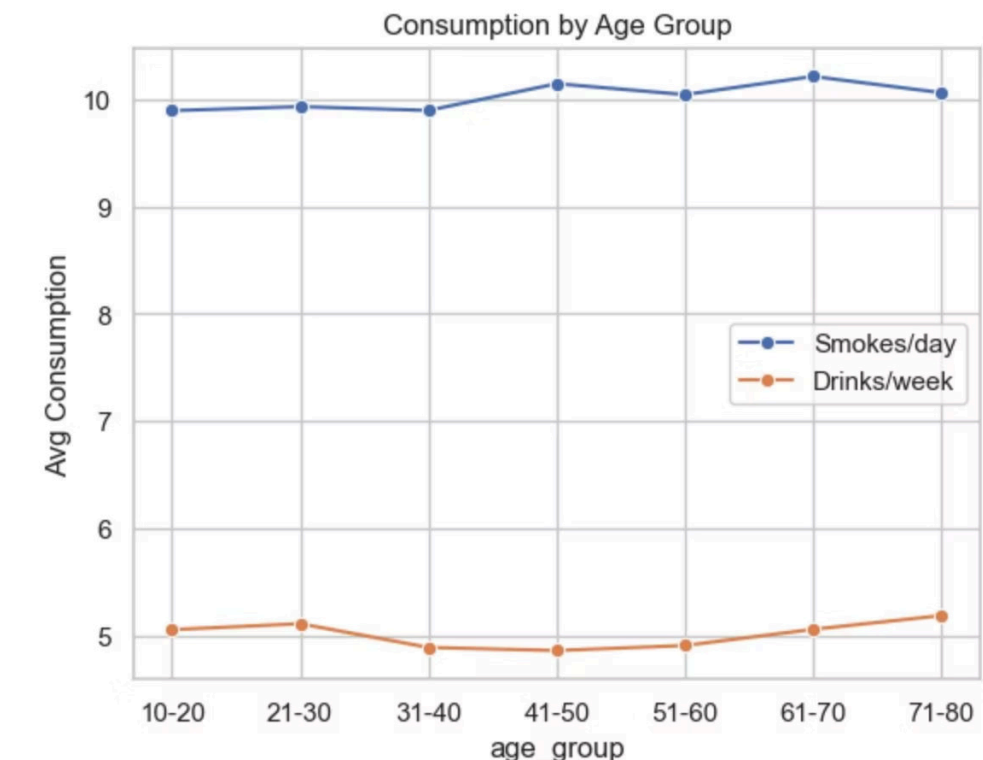
Exercise Frequency vs Addiction



Daily exercisers smoke least (~9.4), while non-exercisers smoke most (~10.6). Exercise reduces addiction.

Interpretation: A physically active lifestyle is a protective factor against addiction.

Age Trends in Consumption



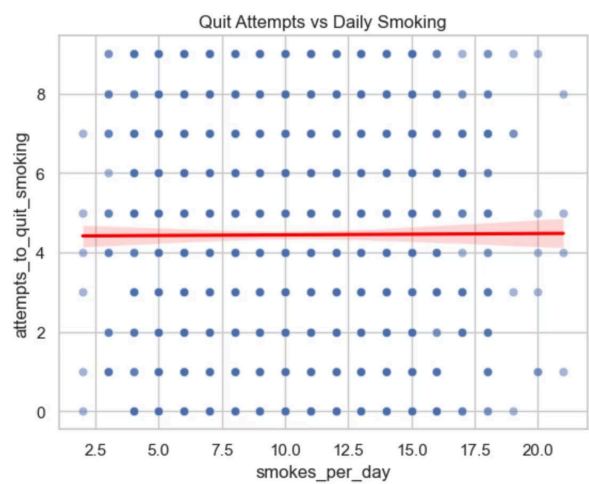
Smoking peaks at age 40-60, drinking at 30-50. Both decline after 60.

Interpretation: Lifestyle changes and responsibilities vary across life stages, influencing consumption patterns.

Addiction Cycle and Support Systems

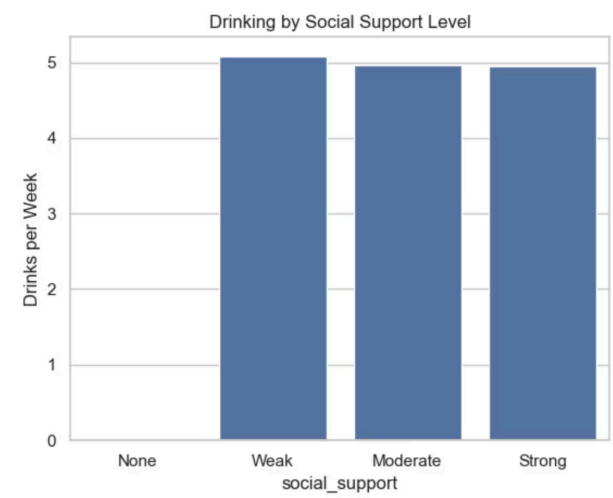
Addiction Intensity

Heavier smokers try to quit more often—strong positive correlation.



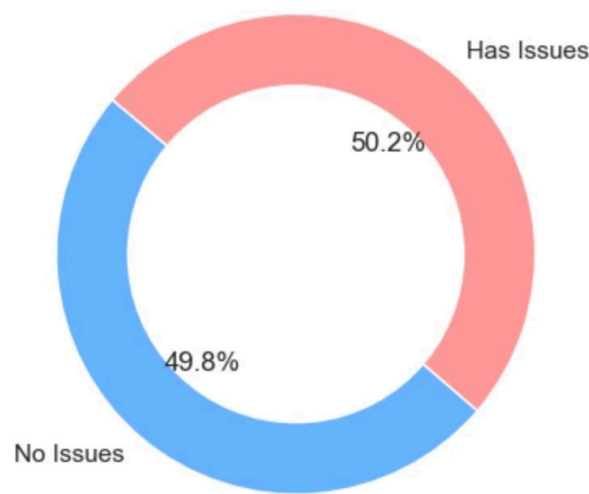
Social Support

Stronger social support = less drinking. Clear negative correlation.



Health Issues

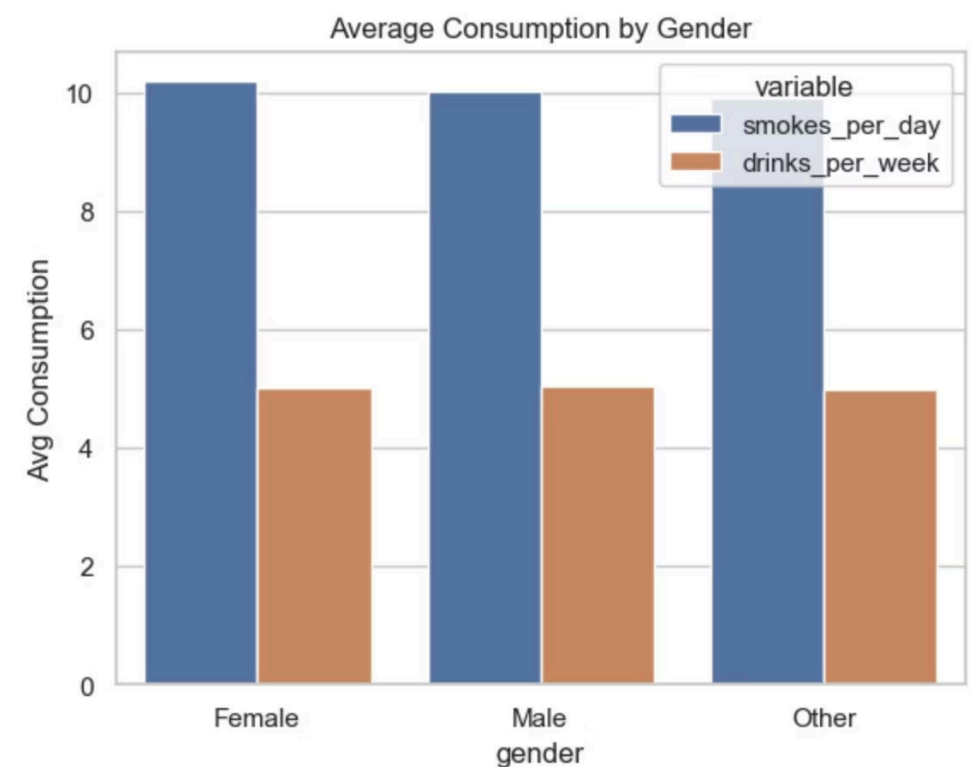
People with health issues smoke more. Health and addiction are linked.



Interpretation: Addiction traps users in a cycle of dependence and relapse. Community connection and health awareness can buffer against addiction risks.

Demographic and Cultural Patterns

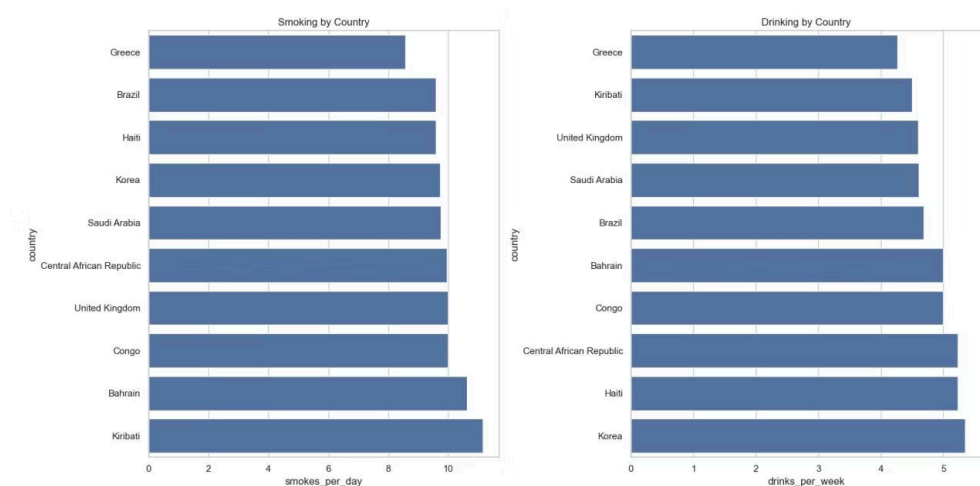
Gender Differences



Males show slightly higher smoking and drinking rates than females.

Interpretation: While the gender gap isn't huge, targeted interventions could help each group based on specific habits.

Country-wise Patterns



Top 10 countries show wide variance. Cultural and regional factors impact addiction levels.

Interpretation: Addiction patterns are not just personal—they're shaped by national and societal norms.

Conclusion: A Holistic Approach to Addiction

The findings strongly suggest that effective intervention and prevention strategies must be holistic. Simply encouraging individuals to quit is not enough, as evidenced by the high number of failed attempts among heavy users.

1

Integrating Mental Health Support

Providing accessible mental healthcare is critical to addressing one of the root causes of addiction.

2

Socioeconomic Empowerment

Policies aimed at improving education and economic stability could serve as a long-term preventative measure against addiction.

3

Promoting Healthy Lifestyles

Encouraging exercise and wellness can provide individuals with positive coping mechanisms.

4

Strengthening Social Support

Fostering community and family support systems can create a protective buffer against addiction.

This data underscores the complexity of addiction and highlights the need for compassionate, data-driven strategies that address the whole person, not just the behavior.