

Regulatory Measures' Effect on Gambling Participation: Experiences From NorwayJonny Engebø^{1,2*}, Torbjørn Torsheim^{1,3} and Ståle Pallesen^{1,3,4}¹Department of Psychosocial Science, University of Bergen, Bergen, Norway, ²The Norwegian Gaming Authority, Førde, Norway, ³Norwegian Competence Centre for Gambling and Gaming Research, University of Bergen, Bergen, Norway, ⁴Optentia, The Vaal Triangle Campus of the North-West University, Vanderbijlpark, South Africa

The purpose of gambling regulation can be to ensure revenue for the public, to prevent crime and gambling problems. One regulatory measure involves restriction of what games can be offered in a market. In this study, the effects of two regulatory market changes are investigated: First, a restriction of availability when slot machines were banned from the Norwegian market in 2007, and second the introduction of regulated online interactive games to the same market in 2014. Data collected from the general population in the period from 2005 through 2018, comprising 2,000 respondents every year, are used to investigate how participation in gambling changed over time. The respondents were asked if they took part in various games or lotteries. Logistic regression analyses were used to predict the proportion participating in five groups of games and if changes in participation coincided with major market changes. The first change was associated with a reduction in gambling on slot machines as well as a reduction in gambling participation overall. Following the slot machine ban, results show an increase in women participating in games offered in land-based bingo premises. A general increase in gambling on foreign websites was also seen, albeit much smaller than the reduction in slot machine gambling. The increases can partly be explained as substitution of one type of gambling with another. New regulated online interactive games were introduced in 2014. Despite the relatively large growth of such games internationally, Norway included, increased online gambling in general and an increased marketing of foreign gambling websites, the participation on foreign websites seemed stable. However, the overall participation in online interactive games increased. The introduction of the regulated alternative seems to have had a channelizing effect. Overall, the changes in gambling participation coinciding with two major regulatory changes can be explained by transformations of physical and social availability, and in terms of mechanisms outlined by the model of total consumption.

Keywords: characterization of gambling, gambling problems, gambling reform, gambling regulation, prevention of gambling problems, substitution

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Introduction

- Regulation of gambling – several purposes, one is to reduce negative consequences from gambling
- Availability to gambling can be, physical, social or cognitive (1)
- Gambling can be affected by competing products, substitution and cannibalization (17)
- Two major regulatory changes:
 - 2007 ban on slot machines / 2009 new VLTs with RG/CP-measures
 - 2014 launch of online interactive games with more RG/CP measures
- The ban in 2007 has been investigated more than the launch in 2014 (2-6)

Two research questions

- 1) Can regulatory changes for specific games or game categories lead to changes in the participation of similar games?
- 2) Can changes for some specific games lead to changes in the total consumption of gambling?

Method and statistics

Use of existing data collected from 2005 through 2018 (June and December) (N=28.000).
Phone based surveys. Data weighted for gender, age and county.

In the statistical analyses, five different dichotomized dependent variables (no = 0, yes = 1):

Gambled or not on

- 1) one or more available games
- 2) land-based slot machines (through 1. half 2007) or VLTs Multix (from 2009)
- 3) games in land-based bingo premises
- 4) games offered from foreign web sites
- 5) online interactive games, but not poker

Method and statistics continues

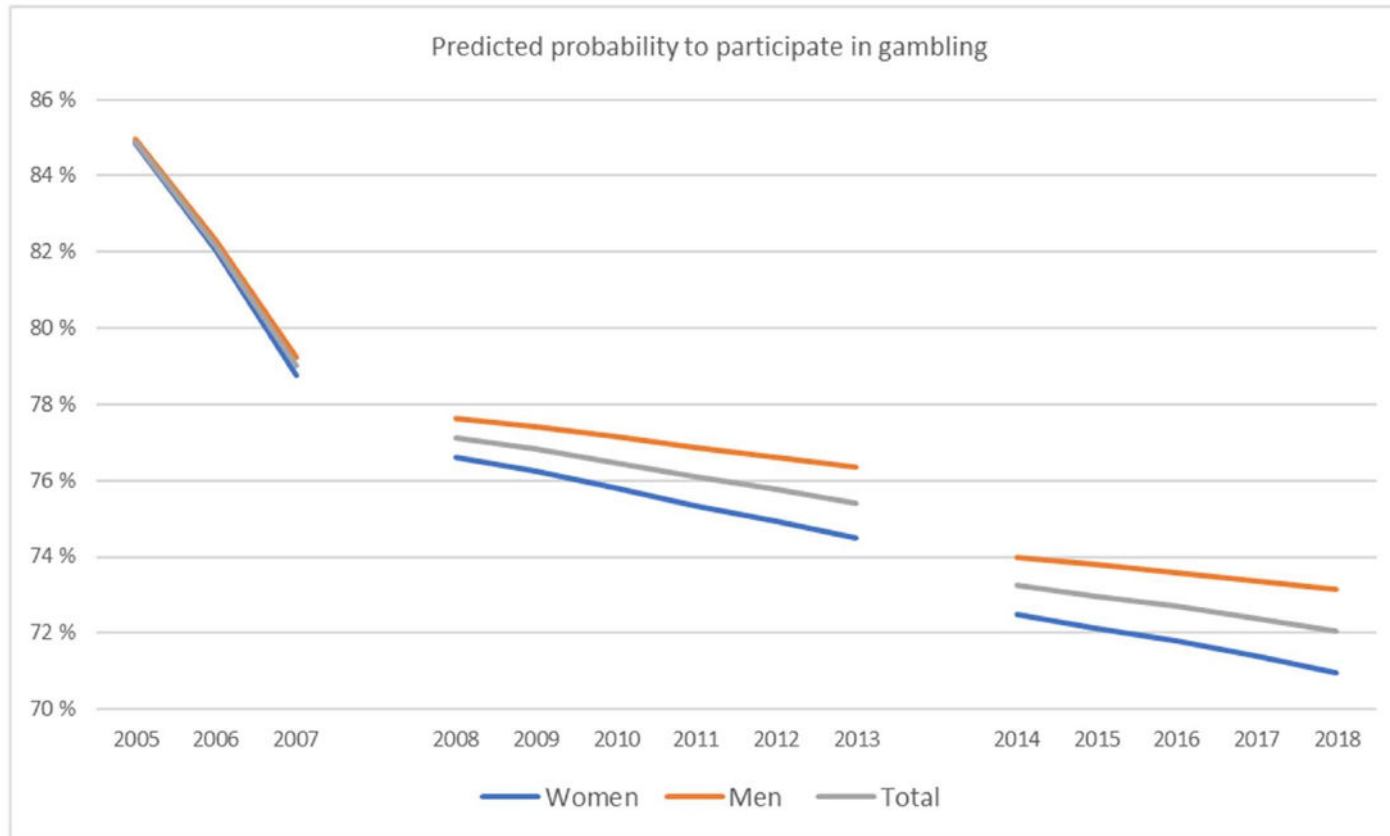
Data analyzed with logistic regression analyses adjusted for different variables:

Independent variables comprised

- year (2005 = 0, 2006 = 1, 2018 = 13)
- epoch (2005-2007, 2008-2013 and 2014-2018)
- gender (female = 0, male = 1)
- age

Results and discussion

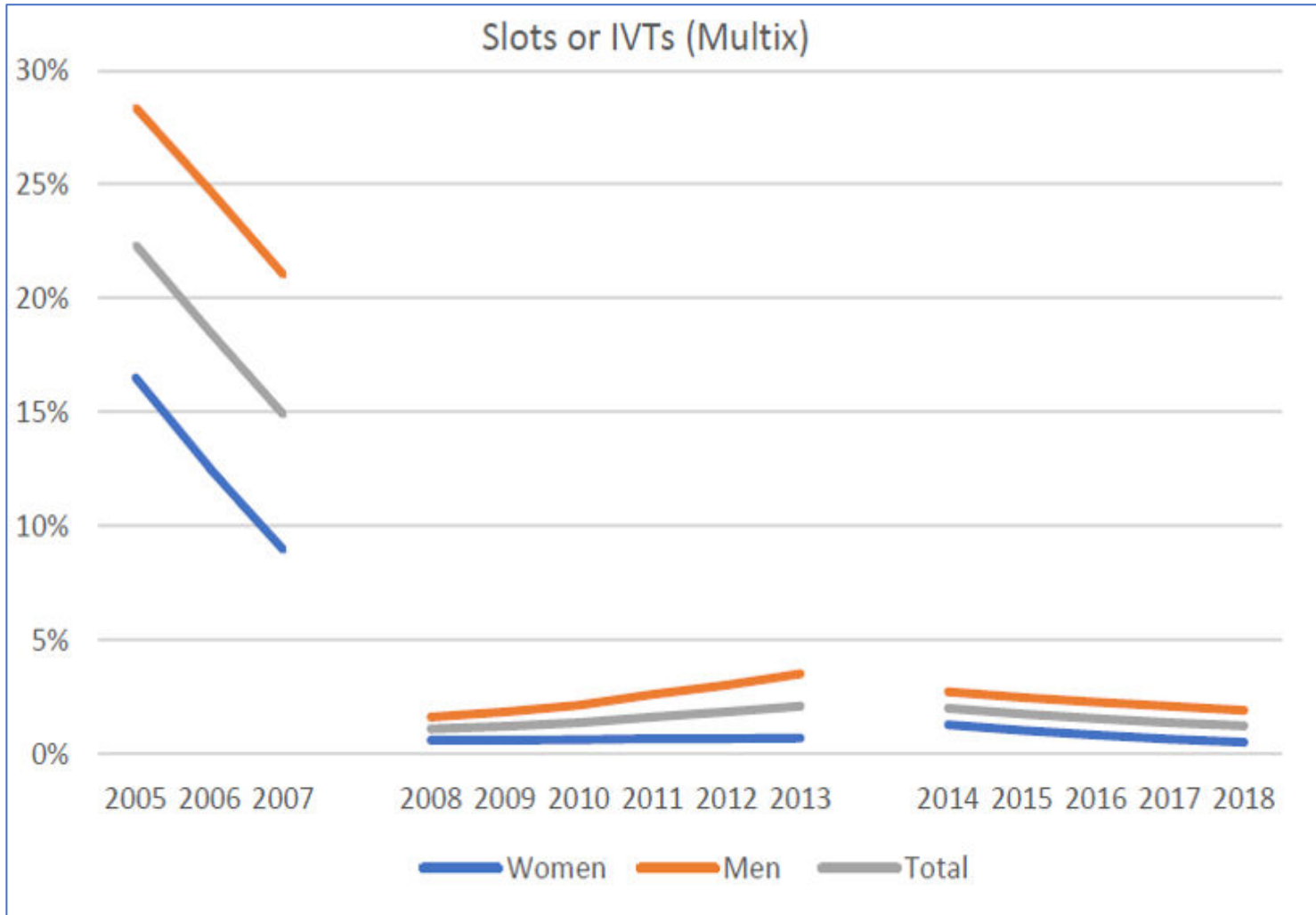
Have gambled (one or more available games)



- Reduction in total gambling participation
- Steepest reduction in the first epoch.
 - a general trend also seen in other countries (e.g., Sweden, Denmark and New Zealand (8-10))

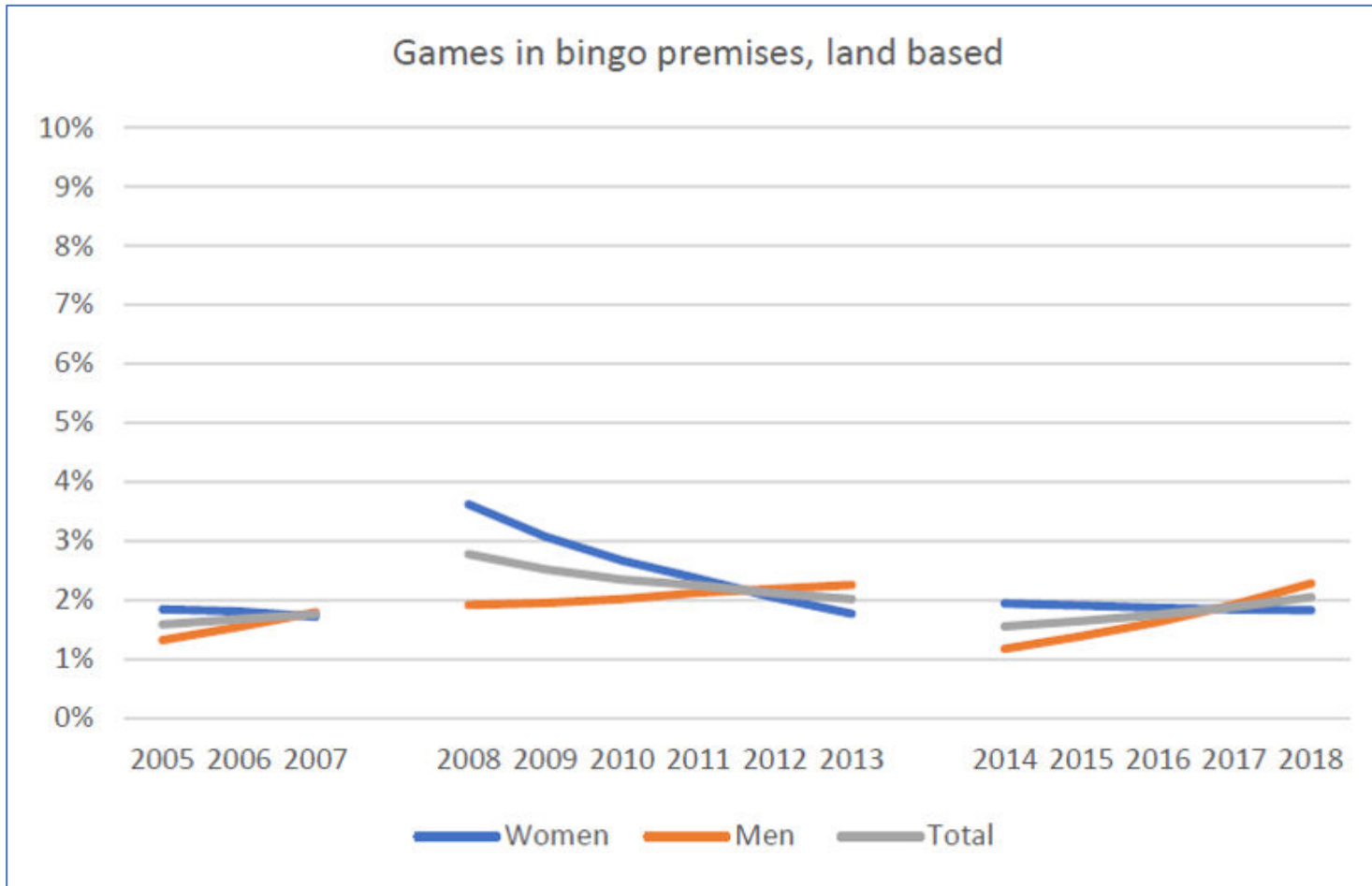
Support was seen for the total consumption model (13) was seen (14). Large drop in both turnover and calls to the national helpline (15), some slot m. gamblers stopped gambling altogether (11,12) reduction in prevalence of problem gamblers (16) . Reduction i people seeking treatment (22).

Have gambled on slot machines or VLTs



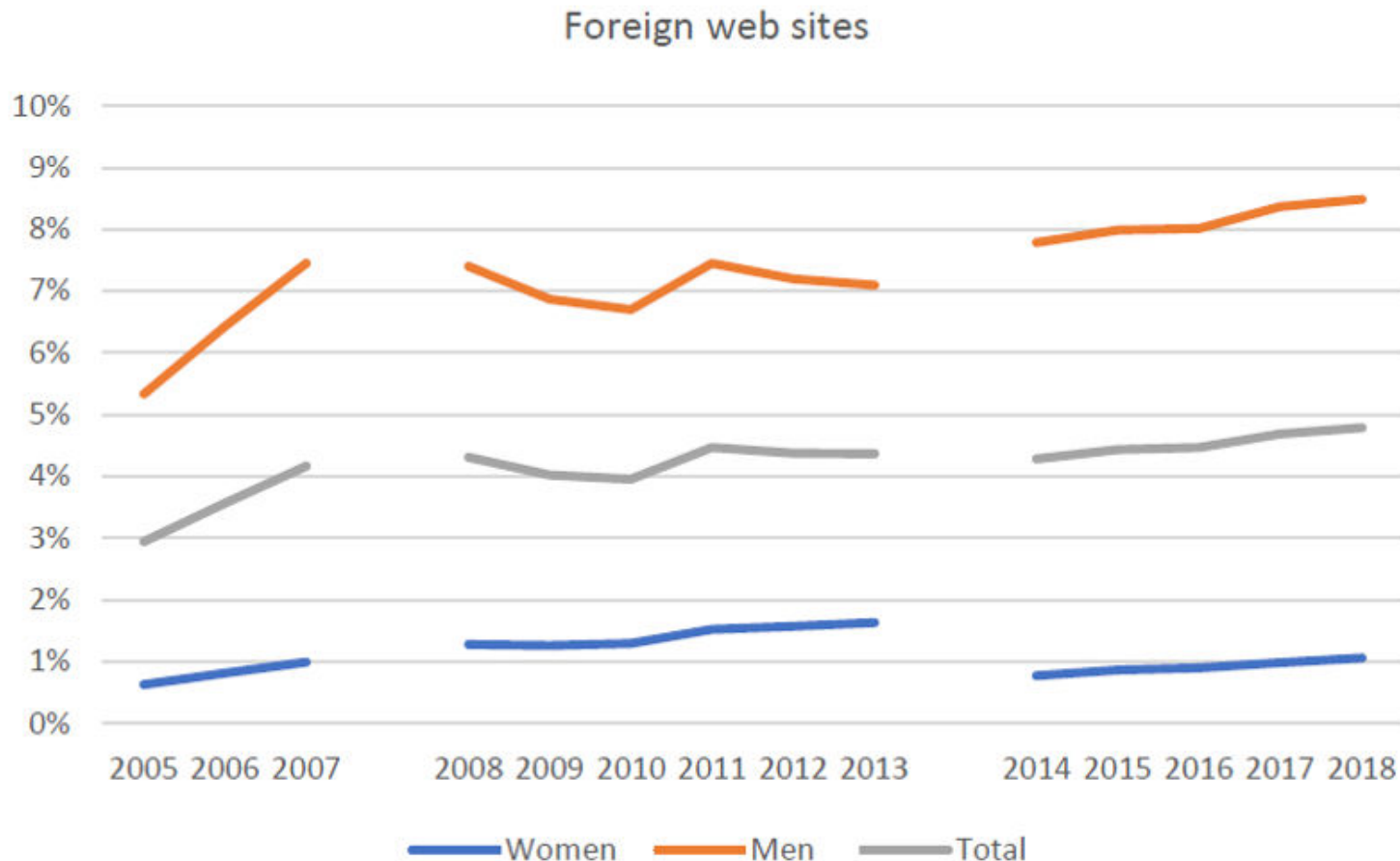
- From epoch 1 to 2, a large drop.
- Lower participation rate for the VLTs (Multix) can be explained with lower accessibility, e.g., fewer machines, stricter regulation for placement and the requirement of player identification.
- Smaller change from epoch 2 to 3 with a decrease for men and an increase for women

Have gambled on games in land based bingo premises



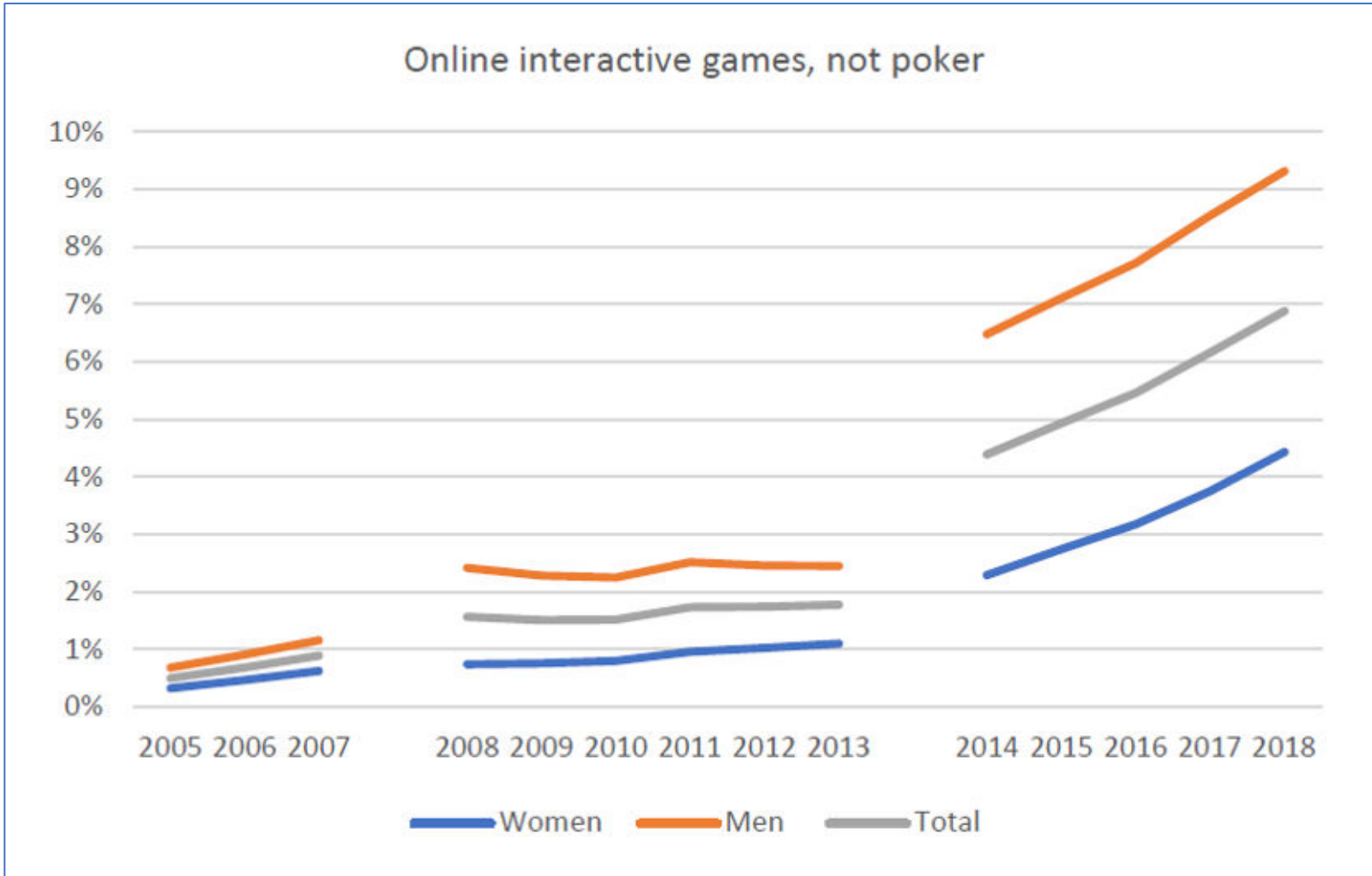
- From epoch 1 to 2, an increase for women gambling on games in bingo premises
=> substitution from old slot machines
- From epoch 2 to 3, a decrease for men
- cannibalization by new online interactive ?

Have gambled on foreign websites



- No/minor increase between epochs. Strongest increase is seen for men through epoch 1.
- In total, stable participation between epoch 2 and 3 despite general and international growth in online interactive gambling (18), increased Norwegian gambling online (19) and heavy marketing from foreign operators (20). => Channelization and regulatory measures (e.g., payment ban)
- Decrease for female participation. Stricter regulation and more RG measures might be preferred since women take less risks (21).

Have gambled on online interactive games - not poker



- Increased participation from epoch 1 to 2 for men
=> substitution
- Stronger increase from epoch 2 to 3
 - the general and international trend
 - increased physical and social availability from a Norwegian regulated alternative to the foreign websites

Summary

Epoch 1 to 2:

- Reduced gambling on slot machines / VLTs (Multix) and overall gambling participation
- Increased female participating in games in land-based bingo premises
- Increased gambling on foreign websites / online interactive games
- Much smaller increases than the reduction in slot machine gambling.
- Can partly be explained as substitution of one type of gambling with another.

Epoch 2 to 3:

- Participation on foreign websites seemed stable
- Increased participation in online interactive games
- A regulated alternative seems to have had a channelizing effect

31th of May 2023:

Reduction in problem gambling

CPGI 8+ (16-74 years)

2022: 23,000 (0,6%)

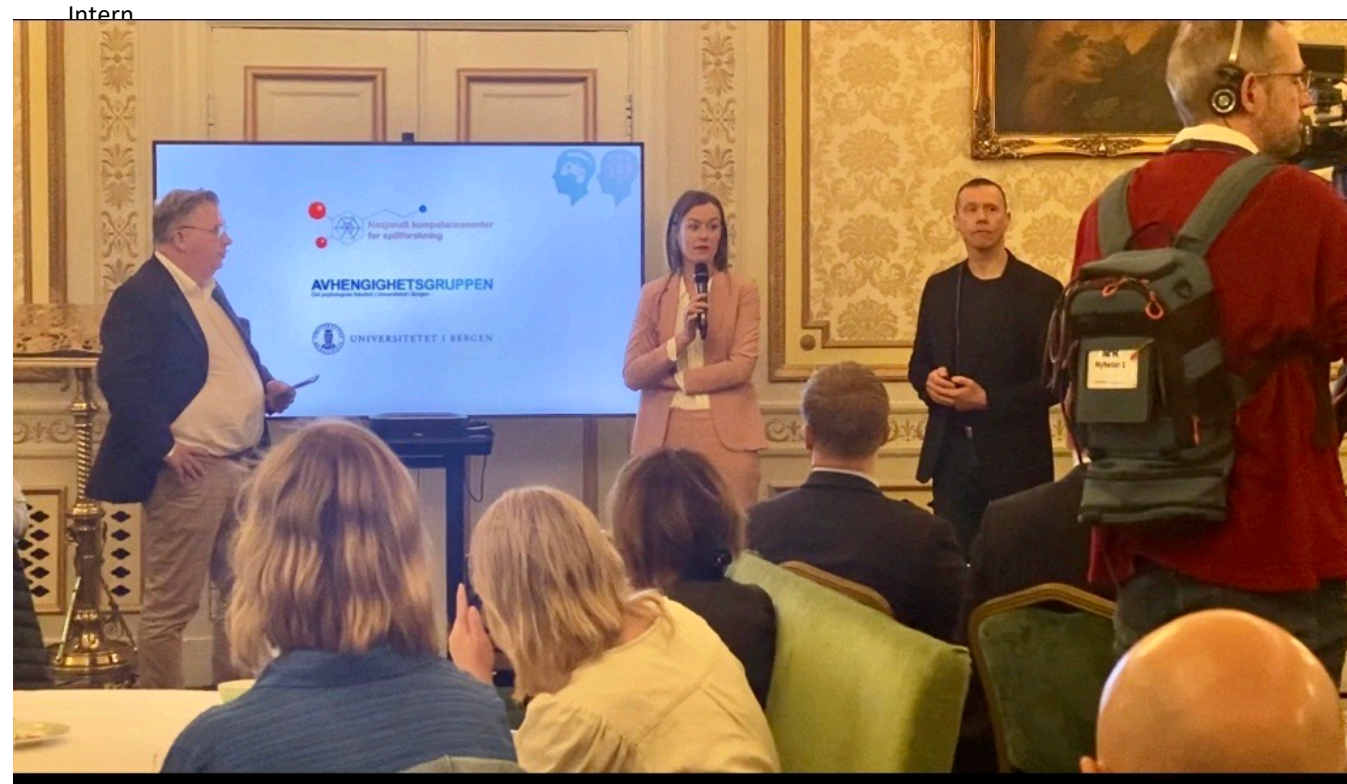
2019: 55,000 (1,4%)

Among the explanations

- more efficient payment ban
- removed TV-adverts from foreign operators
- Norsk Tipping has lowered max loss limits to e.g., online casino

Further channelization is seen.

Source: University of Bergen



Thank you!

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<https://www.frontiersin.org/articles/10.3389/fpsy.2021.672471/full>

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