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To Dream or Not to Dream?

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"Sir, I desire to buy a car and have my cab service someday. Do you think Dream 11 is a good income source in that case?" ---- An ambitious, struggling cab driver in Delhi NCR.

Introduction

Online gambling, an ostensibly nascent phenomenon, has become a prevalent form of entertainment and recreation in today's digital age globally, as per the reports of the Gambling Commission², UK. With the rise of internet accessibility, individuals can now easily access various online gambling platforms and participate in a wide range of games such as poker, slots, and sports betting.

Sociologists have long recognized the allure of casino gambling and have described it as "seductive" in its ability to captivate participants. In the digital age, gambling has undergone a profound transformation with the rise of online platforms, making it more accessible than ever before. The proliferation of online casino games and the evolution of online gambling have generated new opportunities for both individuals and the industry. However, this shift has also brought to light a critical issue: the disproportionate impact of online gambling on lower-income populations. Research suggests that the lower-income demographic is particularly susceptible to the lure of online gambling, often viewing it as achieving a means of financial stability and social mobility that has eluded them through traditional avenues (Cotte & LaTour, 2009).

Lottery vs. Gambling

The lottery is an impulse, while betting and gambling are pre-planned activities³. For a lottery, one buys the ticket based on their lucky number and waits for the draw day to witness the outcome. Winners are selected purely on a random basis from the pool of participants. In gambling, the amount of money one can win is a functional outcome of the money the player has chosen to put in. According to legal definitions and various

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² Refer to https://www.gamblingcommission.gov.uk/statistics-and-research/publication/statistics-on-participation-and-problem-gambling-for-the-year-to-march-2022, last accessed on 8th June 2024.

³ Refer to https://www.kenyans.co.ke/news/major-differences-between-lottery-gambling-and-betting-18032, last accessed on 31st May 2024. Indian Institute of Management Calcutta

associations that govern or directly delve into this business, lottery and gambling are two distinct games with separate attributes. As per the Lithuanian Lottery Association ⁴, by legal definition, a lottery is a game with predefined and established rules where participants engage by buying tickets for a chance to win cash or other prizes. Gambling is a game where participants mutually bet against each other, voluntarily risking an amount they paid with the expectation of seeking monetary gain, where winning or losing is determined by chance, some event, or the result of a sports competition. In a lottery, players compete against each other for a prize fund set in advance, while the lottery operator doesn't participate in the game. For gambling, each individual player competes against the gambling operator. It is in the operator's interest to win against the participants. To understand the outcome and possibility of a win requires some skill. People who believe the outcome is sheer luck lack information about the system and underestimate the skill factor that pushes them to participate. Though the commonality between the two is a strong dependency on the luck factor, the lottery ranks itself higher against gambling under the lens of rationality⁵.

In the Modern Portfolio Theory by Markowitz (1991) and using the expected return⁶ analogy, an individual participating in a lottery shall face a maximum loss of the ticket price they pay (x) and gain of any amount P^L, which can be described as

$$P^L = f(\theta * x) \ \forall \ \theta \in \mathcal{R}^+$$

The maximum loss expected from a lottery is the value of its ticket price, but in the case of gambling, the participant can let go of all their wealth against a betting value, and the loss is much higher.

In the case of gambling, if the participant pays (x) to engage in the gambling session, the expected gain P^G can be described as,

$$P^G = f(\theta * x) \ \forall \ \theta \in \mathcal{R}$$

⁴ Refer to <a href="https://www.loterijos.lt/en/about-the-association/the-difference-between-lotteries-and-gambling/48#:~:text=In%20a%20lottery%2C%20players%20compete,individually%20against%20the%20gambling%20operator, last accessed on 31st May 2024.

⁵ Lottery is considered a more rational engagement than gambling as the lost amount for the lottery is fixed, as is the ticket price. Consider two situations where there is a 50% chance of winning INR 5000 against a 50% chance of losing INR 10 (the ticket price) vs. 50% chance of winning INR 5000 against a 50% chance of losing INR 2500 (the betting amount); the expected utility is higher in the former.

⁶ Refer to https://www.investopedia.com/terms/h/harrymarkowitz.asp, last accessed on 31st May 2024. Indian Institute of Management Calcutta

While there are differences in the expected outcome of both games, one common argument that goes both ways is that gambling and lottery involve thrill owing to uncertainty that differs at a varied level of accessibility.

Figure 1 illustrates the degree of thrill and accessibility involved in these games.

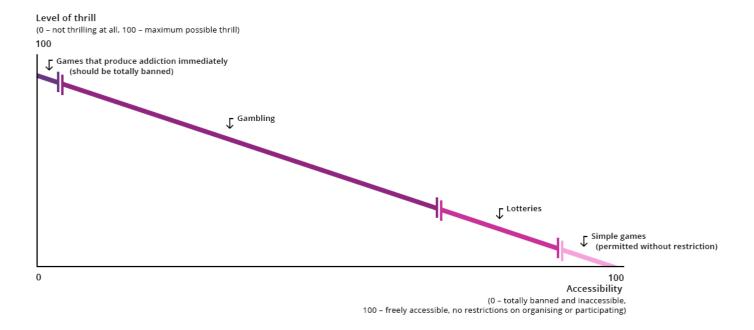


Fig 1: Thrill vs Accessibility. Source: Lithuanian Lottery Association

A concerning question is why individuals seek lottery tickets. According to Friedman and Savage (1948) and Markowitz (1952), people's utility function curves change as they become wealthier (or deviate from their "normal" income). This anticipation of wealth and shift in the utility curve explains why people participating in lottery markets take risks while acting risk-averse in other situations.

The demand for a lottery is contingent more on the gift size than the expected value (Forrest, Simmons, and Chesters, 2002). People participate despite low odds, aligned with the "dream big" narrative. Thus, studies like those by DeBoer (1990) and Cook and Clotfelter (1993) include jackpot size squared to test for a non-linear and positive relationship between jackpot size and ticket sales. According to Blalock and Simon (2007),

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per capita income, disposable income, real income, and the poverty rate can be used to capture the regressive nature of lottery spending.

Incorporating the variable factor of measurement of income elasticity across studies, empirical research uniformly finds income elasticities less than one, the relatively lower income strata, are more prone towards lottery spending with an expectation of windfall gain (Suits, 1977; Clotfelter, 1979; Clotfelter and Cook, 1987, 1989). Level of education typically has a negative relationship with ticket sales (Clotfelter and Cook, 1987, 1989; Kitchen and Powells, 1991; Farrell and Walker, 1999).

The rank dependence⁷ theory defines pessimism and optimism, which, while formally new, were closely related to classical risk aversion and risk seeking. A relatively new phenomenon, likelihood insensitivity, Henkel, L. (2024), is a concept beyond the classical model that reflects a lack of understanding of risk and uncertainty rather than an aversion or a preference. No similar phenomenon can be modelled with expected utility. In the case of gambling and betting, a dearth of understanding of risk is associated with the participation rate of the people.

A recent article by the British Broadcasting Corporation (BBC) claims that investing in cryptocurrency is like gambling⁸. People's interest and participation in Bitcoin and cryptocurrency have also been meteoric. The complexities of blockchain innovation have set an alarm for regulators across the globe to subjugate laws emphasizing the protection of common people and their livelihood as they consider these as an alternative source of investment. Citing the perils of this technological innovation, a government intervention stands imperative. While a pool of researchers argue that the government should promote the blockchain and cryptocurrency sector, proponents against this idea claim a complete outright ban (Feinstein & Werbach, March 2021). Regulations are also seen for stock market investments designed to safeguard retail investors. Numerous skills and technical knowledge are required to guarantee gains from the stock market and cryptocurrencies. Similarly, an online gambling platform advertising itself as a money-making venture demands adequate skills, knowledge, and idealistic luck to secure gains. Should the regulators be vigilant about gambling engagements becoming income and investment alternatives? How does the law protect participants in gambling?

⁷ Refer to https://www.sciencedirect.com/science/article/abs/pii/B9780444537669000173, last accessed on 31st May 2024.

⁸ Refer to https://www.bbc.com/news/technology-65610851, last accessed on 13th June, 2024. Indian Institute of Management Calcutta

Legal Ambit of Online Gambling

As per the Constitution of India⁹, Gambling is referred to as "Any activity or undertaking whose determination is controlled or influenced by chance or accident or any activity or undertaking which is entered into or undertaken with consciousness of the risk of winning or losing (e.g., prize competitions, a wagering contract)."

One of the key advantages of online gambling is the convenience it offers to players. They can enjoy their favourite games from the comfort of their own homes without having to travel to a physical casino. This accessibility has led to a surge in popularity among individuals who may not have easy access to traditional gambling venues. However, online gambling also comes with its fair share of risks. The internet's ease of access and anonymity can make it difficult for individuals to control their impulses and spending habits. This can lead to financial problems and even addiction for some players, as per the reports from the National Library of Medicine¹⁰.

According to Indian law, the outcome of online gambling is determined by players' skill. The Supreme Court has defined skill games as "the games where success depends on substantial degree of skill or not gambling and despite there being an element of chance of a game is preponderantly a game of skill it would nevertheless be a game of mere skill." Further, the Supreme Court has recognized rummy as a game of skill. Referring to two case laws related to an online gambling platform shall help in understanding the depth of the scenario:

- In *Varun Gumber v. Union Territory of Chandigarh*, the Punjab and Haryana High Court ruled that Dream11, and other digital fantasy sports games are not gambling since they require significant aptitude and skill¹².
- The Bombay High Court ruled in *Gurdeep Singh Sachar v. Union of India and Ors* that a player's ability to employ his skill through better knowledge, judgment, and attention determines whether he wins in the Dream11 game. Fantasy sports like Dream11 are, therefore, a game of skill¹³.

⁹ Refer to https://legislative.gov.in/constitution-of-india/, last accessed on 31st May 2024.

¹⁰ Refer to https://www.ncbi.nlm.nih.gov/pmc/articles/PMC8997231/, last accessed on 8th June 2024.

¹¹ Refer to https://aklegal.in/online-gambling-the-legal-framework/, last accessed on 31st May 2024.

¹² Refer to https://aklegal.in/online-gambling-the-legal-framework/#:~:text=In%20Varun%20Gumber%20v.,of%20India%20and%20Ors4, last accessed on 31st May 2024.

 $^{^{13} \} Refer to \ \underline{https://aklegal.in/online-gambling-the-legal-framework/\#:\sim:text=In\%20Varun\%20Gumber\%20v.,of\%20India\%20and\%20Ors4.}\ , last accessed on 31st May 2024.$

Online gambling has been a contentious topic in India in recent years. The Indian Law Commission (LCI) encouraged the government to legalize gambling ¹⁴ in July 2018¹⁵ by publishing a thorough report urging India to legalize gambling to generate much-needed tax revenue¹⁶. However, Dream 11 not being considered gambling is contradictory to the provision of the Public Gambling Act of 1867. If betting on cricket matches is still illegal in India, how can Dream 11, which requires the participants to build a team and earn points, be considered just a game of skill and not gambling? Legalizing betting apps that majorly operate from tax heavens raises numerous questions¹⁷. While the government may legalize gambling, citing a tax revenue benefit, what are the socio-economic costs associated with gambling?

A Dreamy Growth

The fantasy sports sector has been experiencing an indomitable growth trajectory over the last 8 years. The large-scale advertising on multiple media and the ease of access enhances the narrative of online gambling being a reliable and easy alternative source of income. One of the segment leaders, Dream 11, with a 14 crore user base¹⁸, started its operation in 2008 and has never experienced a loss in its business. Though the founders, Harsh Jain, and Bhavit Sheth, are associated with renowned industrialist late Dhirubhai Ambani¹⁹, the company has received multiple legal show-cause notices for tax evasion²⁰.

Dream11 earned a total revenue of INR 6,590 crore for FY23, a jump of 62.4 percent from INR 4,058 crore in FY22. Revenues from operations grew to INR 6,375 crore in FY23, registering a massive growth of 66.3 percent from INR 3,833.5 crore in FY22. Profit after tax increased by 51.7 percent to Rs 223 crore in FY23 from INR 147 crore in FY22²¹.

 $^{^{14}}$ Refer to $\underline{\text{https://timesofindia.indiatimes.com/city/chandigarh/playing-fantasy-games-online-not-betting-high-court/articleshow/59925686.cms}$, last accessed on 31^{st} May 2024.

¹⁵ Refer to https://lawcommissionofindia.nic.in/report_twentyfirst/, last accessed on 31st May 2024.

¹⁶ Refer to https://cdnbbsr.s3waas.gov.in/s3ca0daec69b5adc880fb464895726dbdf/uploads/2022/08/2022081655-1.pdf, last accessed on 31st May 2024.

Refer to <a href="https://scroll.in/article/1061528/what-drives-the-lucrative-murky-world-of-online-cricket-betting-in-india#:~:text=Since%20gambling%20on%20live%20sports,which%20have%20little%20corporate%20regulation last accessed on 13th June 2024.

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¹⁸ Refer to https://yourstory.com/2023/01/fantasy-gaming-unicorn-dream11-revenue-net-profit-earnings, last accessed on 5th June 2024.

¹⁹ Refer to https://startuptalky.com/dream11-biggest-fantasy-game-india/, last accessed on 5th June 2024.

Refer to https://www.moneycontrol.com/news/technology/dream11s-fy23-revenue-soars-by-66-auditor-flags-impact-of-gst-demand-12088371.html, last accessed on 5Th June 2024.

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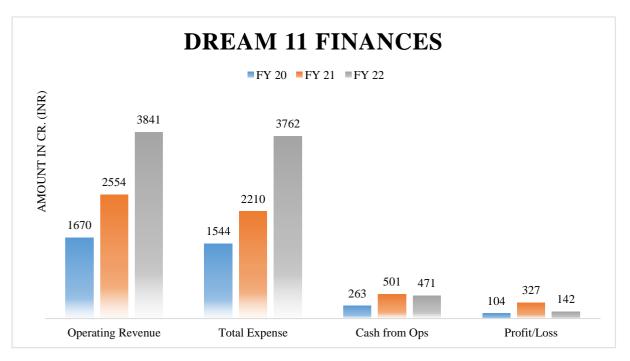


Fig 2: Dream 11 Finances. Source: Entrackr²² and moneycontrol

	FY 21	FY 22
EBITDA margin	13.33%	4.60%
Expense / ₹ of Op Rev	₹0.87	₹0.98
ROCE	19.36%	6.08%

Fig 3: Dream 11 data. Source: Entrackr and moneycontrol

To target more customers, especially the youth, Dream11 spent heavily on advertising and promotions. The company focused on marquee sporting events such as the Indian Premier League (IPL) cricket tournament to attract more customers. As the revenue model requires people to pay a sign-up amount, with the promise of potentially enormous wins through betting, aggressive advertisement is imperative to attract more people. As per multiple reports, the advertisement cost soared high post-COVID as people's engagement time was reduced owing to the resurrection of regular livelihood activities.

²² Refer to https://entrackr.com/2023/01/dream11s-gross-revenue-crosses-rs-4000-cr-in-fy22-profit-dips-56/, last accessed on 5Th June 2024. Indian Institute of Management Calcutta



Fig4: Dream 11 advertisement expenses. Source: moneycontrol

The competitors are not behind in the league. As per a report from Moneycontrol, rival Gameskraft earned a total profit of INR 1,061.86 crore on revenues of INR 2,732.11 crore for FY23, an improvement from INR 930.5 crore profit on revenues of INR 2,153.24 crore in FY22. Mobile Premier League (MPL)'s overall revenue grew to \$104.63 million in FY23, a 63 percent increase from \$64.2 million in FY22. The company's revenues from the Indian market grew 23 percent to INR 521.8 crore (\$64.7 million) in FY23 from INR 424.4 crore (\$57.2 million) in FY22.

Social Cost and Benefit of Gambling

The presence of online gambling companies has proliferated in India over the past decade, creating a few employment opportunities in that sector as an upside. Though the social benefit is limited to some specialized and particularly skilled jobs, social costs are extensive. Internet and technology have given people easy access to venture into the platforms and test their luck of winning big. Time and again, people have fallen victim to the aggressive advertisement of these platforms, promising credible engagement and monetary gains. Lower-income people are prone to such overwhelming promises to change their financially destitute destinies. Researchers at Bristol University have reported a rise in gambling promotions that typically blur the line Indian Institute of Management Calcutta

between advertising for a betting company and popular cultural references. According to The Guardian newspaper, advertisements on social media are alluring young minds into gambling²³. Social shaming and vilifying the victim, unless they commit suicide, once they lose money and, at times, properties, is a common phenomenon; incidents of a similar type have been witnessed in Tamil Nadu, India²⁴. Online sports gambling has victims worldwide. Even highly educated young people fall prey to the decisive and aggressive advertisement campaigns run by these platforms²⁵. Are the regulators doing enough to protect these victims, or has the tax revenue set the priority in precedence?

Discussion and Implications

The evolution of online gambling, especially through platforms like Dream11, has reshaped the landscape of both leisure and financial aspirations in India. While these platforms offer significant revenue potential and attract a broad user base, the socio-economic implications are profound. Lower-income populations, particularly vulnerable to the idea of quick financial gain and a sense of control over gambling fortunes, given the shallow role of skills, often find themselves entangled in a cycle of loss and dependency. This vulnerability is exacerbated by aggressive marketing tactics and the inherent risks associated with gambling. Since the inception of online sports gambling, the narrative was meticulously changed to an engagement promising a windfall income and a lucrative association contrary to any other work. The advertisement claims, using a few celebrity sports personalities, that spending time on these platforms is the best means of engagement. Any other work is too discernible, thus rendering it futile. People often fail to interpret the terms and risks associated with such participation and overestimate the brighter side, staying unaware of the probable losses. A system propagating the show, with multiple victims falling prey frequently, is to be questioned on the same line as the showrunners. An income source that has the potential to put the shelter on a bet is nothing less than a gusty strong cyclone against and contradictory to the promising windfall monetary gain. Additionally, promoting alternative and sustainable income sources through vocational training and skill development can offer more reliable economic opportunities for vulnerable populations.

Dream 11 has 14 investors, of whom 11 are from the UK, USA, and China, taking up the company's value to USD 8bn as of November 26, 2021²⁶. While the information for companies like OYO hotels and Zomato, with a valuation of USD 6bn and USD 12bn, respectively, are publicly available owing to IPO regulations, these

²³ Refer to https://www.theguardian.com/society/2024/mar/17/sneaky-social-media-ads-are-luring-young-into-gambling-say-campaigners, last accessed on 31st May 2024.

²⁴ Refer to https://frontline.thehindu.com/society/families-of-online-gambling-victims-in-tamil-nadu-live-in-shame/article66751333.ece, last accessed on 31st May 2024.

²⁵ Refer to https://www.cbc.ca/news/canada/saskatoon/single-event-sports-betting-problem-gambling-young-men-1.6497962, last accessed on 31st May 2024.

²⁶ Refer to https://tracxn.com/d/companies/dream11/ https://

gaming platforms with a gigantic valuation are barely required to present their financial and non-financial details, making it tough to comment on their financial stability, spend and source. Given the lack of transparency and substantial growth, can these gambling platforms become an easy alternative to convert black money to white? Can they help wade tax? Moreover, these platforms' financial stability and profitability contrast sharply with the financial distress experienced by many of their users. This dichotomy underscores the need for a balanced approach in policy-making that considers both the economic benefits and the social and economic costs.

Policymakers must address the negative impacts of online gambling by implementing stricter regulations and providing better public awareness about the risks involved. In India, where 71% of the adults do not have upper secondary education²⁷, as per OECD data, can a high-risk gamble be let off as a game of skill? If regulations are imperative for stock markets and cryptocurrencies, what hinders a regulatory act against online gambling?

To conclude, while the digital transformation of gambling has created new economic opportunities, it is necessary to safeguard against its potential costs. A comprehensive regulatory framework, robust disclosure, and public education and support systems are essential to mitigate the adverse effects and ensure a balanced approach to this rapidly evolving industry.

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²⁷ Refer to https://www.oecd.org/education/education-at-a-glance/EAG2019 CN IND.pdf , last accessed 11th June 2024. Indian Institute of Management Calcutta

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