INDIA AND TOBACCO – RETHINKING THE ISSUES AND THE SOLUTIONS

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‘Rethinking Nicotine’ @GFN 2018, Warsaw
2nd most populous country

- >1.35 billion people (2017-18)
- 18% of world population
  - Almost x3 EU population!

A ‘young’ country

- 65% of population <35 years
  - Almost x4 age-matched EU population!

1/3rd urban and 2/3rd rural

The fastest growing economy & engines of global growth (IMF, 2018)
  - Regional economic inequalities high!

Multilingual with diverse cultural & religious ethos
  - A country made-up of many countries!

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• **3rd largest tobacco producer**
  • > 800 million kg per year
  • Mainly **5 varieties** of tobacco grown
    • A ‘demerit’ good
  • Tobacco Board of India (Min. of Comm. & Indust., GOI) controls!

• **2nd largest tobacco consumer**

• Unique ‘rainbow pattern’ of tobacco usage landscape!

'SLTL > Smoking (Local) > Smoking (Cigarette)'

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Considerable variation…

- Gender, regional, economic and literacy & awareness

♂ – dominant user overall

♂ – dominant smokers

♀ – dominant SLT users

Chewing (SLT), smoking (S) & mixed (SLT + S)

Multiple issues & challenges

‘RAINBOW’ TOBACCO USAGE LANDSCAPE

SLT 47%

S 35%

SLT + S 18%

♂

♀

SLT 82%

♂

♀

S 11%

SLT + S 7%

♂

♀
Considerable variation...

Smoking tobacco
- Standard form
  - Cigarette, Cigar, Cigarillo, etc.
- Alternative/local forms
  - Bidi, Hukkah, Shisha, Chilam, etc.

Smokeless tobacco (SLT)/Chewing tobacco
- Khaini, Gutkha, Zarda, Scented tobacco, Zafrani patti, Herbal tobacco, Chuna (lime)-mixed tobacco, etc.

Betel (Areca) nut (WHO grouping under SLT category!)
- Betel quid (paan), Mukh shuddhi, Paan masala, Pan parag, Paan bahar, Paan pasand, Paan diwan, Paan mukhwas, Tulsi, etc.
• The ‘rainbow’ snap-shot!
• Every 5\textsuperscript{th} adult is SLT user and every 10\textsuperscript{th} adult smokes tobacco!
• Increasing prevalence of tobacco with increasing age (25+ years)
  • 48\% prevalence among 65+ year old
• Average daily expenditure on tobacco products
  • Cigarette: Rs. 30.00 (under 0.5 US$)
  • Bidi: Rs. 12.50
  • SLT: Rs. 12.80
• Average initiation age low among GATS countries (under 20 years)
  • ♂: 18.3 years and ♀: 17.2 years
• Quit ratio 2\textsuperscript{nd} lowest among GATS countries
  • China, India, Indonesia
• Standard tobacco control measures applied!
• Benefits are apparent!
• **Reduction** in overall tobacco prevalence
  • 6%age point
• **Decrease** in tobacco users
  • 8.1 million
• **Decrease** in prevalence among youth (15-24 years)
  • 17%
• **Increased** age of initiation
  • Average 1 year
DISTURBING TRENDS: INDIA (1990-2016)

- Population increase!
- Heavy cigarette smokers
  - ♂ < ♂
- Increased tobacco expenditure
  - x 2
- BN & ‘gateway’ effect!
- Changing disease demography!
  - Dominant life-style related diseases!

Population change: India
- Billion
- 1990: 0.87
- 2016: 1.32

Leading Causes 1990
1. Diarrhoeal diseases
2. Lower respiratory infection
3. Neonatal preterm birth
4. Tuberculosis
5. Measles
6. Ischaemic heart disease
7. Other neonatal
8. COPD
9. Neonatal encephalopathy
10. Iron-deficiency anaemia

Leading Causes 2016
1. Ischaemic heart disease
2. COPD
3. Diarrhoeal diseases
4. Lower respiratory infection
5. Cerebrovascular disease
6. Iron-deficiency anaemia
7. Neonatal preterm birth
8. Tuberculosis
9. Sense organ disease
10. Road injuries


* Tobacco control measures need strengthening!
* Other avenues of tobacco control and harm reduction required!
THE SOLUTIONS: SMOKING 1?

• Usual THR avenues mostly penetrate the legal cigarette smokers
  • ~ 110 million: young, mostly urban Indians & males
• Over 80% aware of health consequences
• Under 50% smokers intended quitting (GATS-2)
• Under 40% attempted quitting (GATS-2)
• Intensification of advocacy required
• ENDS (ecig, hnb, etc.) appears as additional potential options of HR
  • Non-tobacco, non-combustible
    • Significantly safer
    • It appeals to the urban youth
• Newer technologies with quality assurance could be a game changer

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THE SOLUTIONS: SMOKING 2?

• Larger segment of population smoke local/alternative cigarette substitutes (Bidis, Chilams, Hookahs, etc.)
  • No reliable estimates available (significantly more than 110 million)
    • Highly variable age, cultures, economies and ethnicities
    • Primarily rural but, also urban
    • Predominantly men

• Currently no significant penetration of HR avenues

• Aggressive & sustained advocacy for awareness required

• Cost effective THR avenues required for this target group!
  • Newer THR technologies and economically matching options
THE SOLUTIONS: ‘ENDS’ AS AN OPTION

RESPONDERS (n = 3000)
- 20% Male
- 80% Female

FIRST EXPOSURE (n = 3000)
- 2% Smoking tobacco
- 9% SLT
- 17% Pharma
- 71% E-cig

EDUCATIONAL BACKGROUND (n = 3000)
- 11% Professional
- 26% University
- 62% High school

PERCEPTION: E-CIG vs. TOBACCO (n = 3000)
- 8% Healthy & Safe
- 12% Less harmful
- 9% Equally bad
- 60% More harmful

E-CIG EFFECT: ON SMOKING (n = 2350)
- 30% Quit
- 41% Reduced
- 13% Relapsed
- 13% No effect
- 2.00% Increased

E-CIG EFFECT: ON EXISTING MEDICAL CONDITIONS (n = 996)
- 42% Fully resolved
- 50% Partially resolved
- 7% No effect
THE SOLUTIONS: SLT/BN?

• BN/SLT used by the largest segment of population
• India: global dominance on SLT/BN usage
  • Sketchy estimates (GATS-2: ~210 million)
  • High prevalence among women!
    • Could be cause of ‘genetic pre-disposition’ to addiction thru generations!
  • Highly variable cultural, economic and ethnic groups
  • Highly prevalent in rural areas

• Virtually no penetration of HR concept
  • Initiator & persistent advocacy
  • Highly cost effective HR avenue required for this group!
    • ENDS may not be very effective!
    • Snus or equivalent?!
THE SOLUTIONS: ‘ENDS’ AS AN OPTION

RESPONDERS (n = 3000)
- 20% Responders Male
- 80% Responders Female

FIRST EXPOSURE: TO TOBACCO (n = 3000)
- 71% Smoking tobacco
- 17% SLT
- 9% Pharma
- 2% E-cig

EDUCATIONAL BACKGROUND (n = 3000)
- 62% Professional
- 26% University
- 11% High school

PERCEPTION: E-CIG vs. TOBACCO (n = 3000)
- 60% Healthy & Safe
- 12% Less harmful
- 9% Equally bad
- 8% More harmful
- 9% More harmful

E-CIG EFFECT ON SLT (n = 680)
- 38% Quit
- 21% Reduced
- 9% Relapsed
- 30% No effect
- 0.30% Increased

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THE SOLUTIONS: GENERAL

• Tobacco using population group in India: **mixed age-group**!
  • THR avenue must **appeal** to all age-groups, especially to the youth!
  • ‘**Graded**’ avenues of HR

• **Awareness and advocacy** coupled with motivation
  • Regional and **linguistically-adjusted strategies**
  • Consider the long-term **cultural association**
  • Consider associated **economic and livelihood issues**

• The best option – **No initiation** of BN/SLT/tobacco and **motivational quitting**!

• **2nd best option – Harm reduction**!
  • **Wider choice** of HR options
  • **Economically suitable, quality assured options** driven by **technology**
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