The Pursuit of Research Integrity - An Evaluation

Sivakumar. A
International Medical University, Malaysia
How bad behaviours could be provoked in young research minds/ prospective research fellows and ultimately influence on moral codes?

Imprinting of optimal misbehaviour

“everybody does it”
• To highlight the subtle characteristics that encroach on integrity in research.

• To assess how inappropriate circumstances influence the graduate students’ psyche and subsequent activities
## Methods

<table>
<thead>
<tr>
<th>Setting</th>
<th>Participants demography</th>
<th>Participants size</th>
<th>Proposed rewards</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Dental interns from parent school</td>
<td>10 (9+1 actor)</td>
<td>Co-authorship</td>
</tr>
<tr>
<td>2</td>
<td>Dental interns from parent school</td>
<td>10 (9+1 actor)</td>
<td>Co-authorship plus economic incentive</td>
</tr>
<tr>
<td>3</td>
<td>Dental interns from parent school &amp; other school</td>
<td>10 (9+1 actor)</td>
<td>Co-authorship</td>
</tr>
<tr>
<td>4</td>
<td>Dental interns &amp; investigator from parent school</td>
<td>11 (10+1 actor)</td>
<td>Co-authorship</td>
</tr>
</tbody>
</table>

**Materials provided to the participants:**
1. A sheet of pain VAS scores (baseline and after 6 hours) of 26 patients (jumbled) from a drug trial
2. Pencil, sharpener and eraser
3. A leaflet mentioning the nature of participant’s involvement
Nature of the Actor

Setting 1  one amongst the peers of the same school
Setting 2  one amongst the peers of the same school
Setting 3  Actor from parent school, but rest 9 participants were from another school
Setting 4  Actor was the investigator himself and 10 participants were from same parent school

Role of the Actor

Exhibit misconduct openly
Results

<table>
<thead>
<tr>
<th>Setting</th>
<th>Total Participants</th>
<th>No. of Participants did misconduct</th>
<th>% of participants misconduct</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>9</td>
<td>4</td>
<td>44%</td>
</tr>
<tr>
<td>2</td>
<td>9</td>
<td>7</td>
<td>78%</td>
</tr>
<tr>
<td>3</td>
<td>9</td>
<td>2</td>
<td>22%</td>
</tr>
<tr>
<td>4</td>
<td>10</td>
<td>3</td>
<td>30%</td>
</tr>
</tbody>
</table>

Fig.1: % of participants modified the data at different settings
Fig. 2: Modified VAS at different settings
Lesson 1

Circumstances play a major role

1. Presence of reward
2. Presence of additional economic incentive
3. Group heterogeneity
4. Leadership malpractice
Lesson 2

People see each other behaving

In fact, every day when we open the news we see examples of people doing wrong things. What does this cause us?
Lesson 3

The glorious trap of instant gratification
• Is there ‘righteousness’ in the heart?
• Publish or perish
• Research has large social implications
• The scenario of financial gains before moral obligations
The ultimate responsibility for good research practice lies with individual researchers. However, such practice can only flourish in a favorable environment.
Limitations

• Small sample size with no controls and less robust study model

• Probability of getting caught was not assessed

So what’s the status of cost-benefit analysis?
Conclusion

Though not an ideal social experiment, the assessment highlights certain variables for research integrity

• Young students were prone for misconduct when they witnessed malpractices happening around them and more so when money was involved.

• An element of honesty noted if the misconduct happened out of the group
Satya Yug
(Golden Era)

Treta Yug
(Ramayana)

Dvapara Yug
(Mahabharata)

Kali Yug
(Present)
Have a nice day...