Future Trends Report
Based on Analysis of the Team's Chosen Community/Organisation in Mid-Term and Final Evaluation

Community/Organisation Studied:
Teenagers, Counsellors, Ministry of education

STEP 1. Identify Challenges

Read the Future Scene carefully and generate ideas for challenges, concerns, and possible related problems. Choose the 5 most important challenges and write them in the space provided. Include applicable research with appropriate in-text citations.

Challenge #1: FOMO can cause depression and other mental health issues

Observation:

Based on our survey conducted online, answering the question about their experience with FOMO, about one third of the respondents said that they were sad because they experienced FOMO. Many of them specified feelings of sadness, anxiety, loneliness were amplified due to social media.

Problem:

As a result, teenagers might feel unsatisfied and jealous that they are not living as good of a life as their peers even if this might not be the case beneath the masks of social media. However, in reality, they are really just comparing their mundane lives to their friend's highlight reels. In this way, social media. is to a certain extent a false reality. Spending a long time looking at their friends posts can lead to negative emotions, making them feel as if they are by themselves. This may lead to anxiety, depression and feelings of loneliness. There are severe cases that have catastrophic consequences, for example, when teens commit suicide.

Research:

- A 2018 report by Physician's Computer Company states "Suicide is the cause of 13% of teenage deaths in the U.S." and later in the article, they stated that "Social media is one of the biggest contributing factors to depression in adolescents."

- Based on a 2018 report written by Gigen Mammoser, it states that "A new study concludes there is in fact causal link between the use of social media and negative effects on well-being, primarily depression and loneliness"

- The same article (2018 report by Gigen Mammoser) also quoted in an interview with Amy Summerville, PhD, a professor of psychology at Miami University in Ohio, that "The FOMO experience specifically is this feeling that I personally could have been there and I wasn't. I do think that part of the reason that's really powerful is this cue that maybe we're not being included by people we have important social relationships with."

- Based on a recent article by Rhys Edmond published by centre for mental health states "From another angle, online platforms may also have the potential to damage mental wellbeing through promoting unreasonable expectations. Social media has been linked to poor self-esteem and self-image through the advent of image manipulation on photo sharing platforms."

Challenge #2: FOMO can lead to social media addiction

Observation:

Based on our survey conducted online, 67.1% of the teens who admitted that they use social media platforms for more than an hour a day, while 33.3% of them pointed out that the reason for the long usage on these platforms was due to FOMO. Due to the long hours spent on social media, we deduced that FOMO in social media really could trigger social media

Problem:

This is problematic because FOMO is known to drive long hours on phones especially for teens. Furthermore, teens are fueled by the feeling that their lives are not rewarding enough resulting in much time spent online. This could seriously lead to addiction. However it does not end there, addiction is a serious problem that could result in even more problems. A few examples are; inattentiveness, wasting huge amounts of time and could potentially end up affecting their health due to sleep deprivation etc.

Research:

- Based on a study conducted by Norrington Trent University, the researchers observed the collective factors driving the subjects' addictive behaviour, and found out that, FOMO, irrational beliefs and poor mental health explained participants' social media addiction almost entirely.

- "When experiencing FOMO chronically, it could lead to addictive behaviour towards social media use," said Dr Halley Pontes, a psychologist in Nottingham Trent University's School of Social Sciences.

- An article written on 7th February 2020 by Yoho stated that "Previous studies have linked the consumption of social media to a wide range of mental health conditions, ranging from anxiety and poorer sleep quality to inattention and hyperactivity.

Challenge #3: FOMO can lead to lack of self-identity and lack of the sense of belonging

Observation:

Based on our interview with a councillor, she told us the teens lacked a sense of belonging. She also mentioned the teens wanted to do everything their friends were doing, leaving them little time for themselves. This non-stop chasing what their friends do can greatly lead to a lack of self-identity. Whatever they did that shaped their lives for these teens mostly come from their friends, whether they liked it or not.

Problem:

This could be problematic because identity shapes a person. A lack of belonging and self-identity could lead to low self esteem. Furthermore, instead of experiencing events for themselves, they look at how people live their lives through a virtual window. They think that their friends are experiencing a good time, while their life is boring. The fact that they spend much time browsing through their friends' photos, it adds to the sense of FOMO, which would add to the lack of self-identity and sense of belonging. The vicious cycle continues. In the long run, a person can become more withdrawn and quiet, or even cynical.

Research:

- An article by Sherri Gordon published on 7th October 2019 stated that "the problem is that incessant worrying about what everyone else is doing only causes teens to miss out on their own lives even more". In fact, FOMO causes people to keep their attention focused outward instead of inward. This, in turn, may cause them to lose their sense of identity and to struggle with low self-esteem"

- An article by Rae Jacobson published by Child Mind Institute stated, "Kids view social media through the lens of their own lives" ... "If they're struggling to stay on top of things or suffering from low self-esteem, they're more likely to interpret images of peers having fun as confirmation that they're doing badly compared to their friends."

Challenge #4: FOMO can lead to materialism in teens

Observation:

Based on our survey, about 15% of the reponses commented about them feeling left out because they saw a product online, but could not obtain it. This feeling of disappointment and being left out is amplified when they see their friends/favourite celebrity/family members using the product. This could easily lead to materialism, where teens obsess over the product and would sacrifice everything just to get the new product.

Problem:

A materialistic lifestyle can impact teens negatively. A materialistic lifestyle is defined as one thinking that goods and wealth are the most important things; valuing materials over more important things (etc friendships). A materialistic lifestyle's problem mainly lies in the perception of the teens. They think that money, that can buy them all the things seen online, can bring them happiness forever. This mindset fuels a greed that can never be satisfied. They want more and more products. In the long run, the way the teens view the world with this mindset can make them narcissistic and self centered.

Research:

- An article in 2016 published by Julia's Civic Issue Blog states "Social media is among the leading causes of materialistic mindsets among youth. Not only does the advertising that we see on a daily basis play a role, but we have equated our self worth and the worth of others to quantitative data."

- An article published in 2019 by SpringerLink states "Based on the theory of self-determination, this study examined whether fear of missing out (FoMO) would mediate the relationship between materialism and adolescent problematic smartphone use, and investigated the moderating role of narcissism in this mediating process."

- An article written in 2006 by Carey Goldberg states "Materialism is bad for the soul. Only, in the new formulation, materialism is bad for your emotional well-being...Materialism can create a nagging appetite that can never be satisfied."

- Tim Kasser, a psychology professor at Knox College in Illinois who has led some of the recent work(pertaining to materialism) commented ""Consumer culture is continually bombarding us with the message that materialism will make us happy...What this research shows is that that's not true."

Challenge #5 : FOMO can lead to time wastage on social media for teens

Observation:

Based on our survey, 67.1% of the respondents answered that they spend more than an hour per day only on social media, not including the usage of other apps on their phones. This is most likely caused by FOMO as the teenagers would not want to be left out in the chain of information posted online.

Problem:

When teenagers are suffering from FOMO, they unconsciously spend huge chunks of time on social media. When teens spend that huge amount of time, they have less time to spend on more meaningful activities that actually yield value (eg. studying and exercising). However, that is not all, FOMO causes teens to use up the time supposedly allocated to other activities, causing them to procrastinate both consciously and unconsciously. This would result in them being unable to get their necessary activities done due to time wastage.

Research:

- Based on a BBC News School Report story published on 1st March 2017, nine 11th Grade students took on the challenge of trying to turn their backs on Facebook status updates, Twitter posts and snapchat messages for a week. While some of them managed to have more time to do their work in better quality, others found out that they suffered from FOMO which also caused them social media addiction, and thus causing them to be unable to spend their time meaningfully and satisfactorily without social media.

STEP 2. Craft the Underlying Problem

Using the challenges listed in Step 1, identify a problem of major importance to the chosen community / organization in the future. Write your Underlying Problem making sure your question clearly explains the action that will be taken and the desired results/goal of that action.

Underlying Problem:

Given that largest community of people to be affected by FOMO are teenagers, it appears that many of them suffer from mental health issues, addiction and lack of self identity, which could branch out into more problems and negatively impact their lifestyle, **(Observation)** how might we assist the teens to overcome this phenomenon **(Key Verb Phrase)** so that they might not have to suffer from the impacts of FOMO **(Purpose)** from now on in Singapore? **(Future Scene Parameters)**

STEP 3. Produce Solution Ideas

Generate solution ideas to the Underlying Problem in Step 2. Choose the 5 most effective solutions and write the elaborated ideas in the space provided. Include applicable research with appropriate in-text citations.

Solution 1: Creating a website to spread awareness

We will try to create a website in order to spread awareness of this phenomenon through website creating platforms (eg. Wix and Google Sites). We interviewed an experienced councillor, so we think the advice we obtained for her can be placed up there, together with more advice from other councillors we could interview in the future. We will also try to include experiences from other teens who overcame FOMO and try to give their best advice for teens who are suffering from the effects of FOMO. It would be most useful if the teens could read the experiences, together with words of advice so they might be able to make more informed choices for themselves.

Research (on why a website would be useful):

● "When used correctly, a powerful website with nonprofit tools and built-in design features can make spreading awareness and building a following for your cause much simpler." An article published in 2015 by Christine Soucy stated.

● "Unlike having a local brick and mortar establishment, a business Website transmits your business profile around the world, permitting for enhanced exposure and sales, due to a wider demographic reach." (in this case, ourselves).

Solution 2: Utilising algorithms (in forms of apps) to curate a positive lifestyle for the teens

We will lobby tech companies to help us create a 'FOMO' (**Finally Over Missing Out**) app so it can run smoothly. Since our topic is about curated lives, lives can be curated positively too. Allowing algorithms to filter and organise one's schedule can bring about a lot of benefits. Some apps are solely based to help to arrange schedules, however ours is combining many functions to help teens overcome FOMO.

Such functions include:

- The algorithm managing and filtering notifications so that thet teens would not be distracted and inclined to spend time on social media the moment they have the chance

- A schedule planner to organise and plan their activities, so they have enough time to complete more things on their plate

- List down their goals, priorities and achievements in order to give them motivation to work towards it

- This algorithm could suggest activities teens could engage in (eg. sports and volunteer work) instead of spending time on social media

- Later after the teens have found an interest, the app could suggest certain free times to fill in these activities into their agenda

Research:

- Based on a 2017 article by Chandra Johnson, it stated that "we are finally reaching a state of symbiosis or partnership with technology". Microsoft principal researcher, Jonathan Grudin, told Pew "I'm optimistic that a general trend toward positive outcomes will prevail".

- According to an article by Steven Rosenbaum, "we're living in a time of digital abundance, which is wonderful. It promises to give us a new way to explore, connect, share, and learn. But it needs to be harnessed to make *your life* better, otherwise it threatens to turn it into hamsters in a wheel of information".

Solution 3 : Schools and parents taking mandatory measures to

help teenagers affected by FOMO

We will try to get the Ministry of Education to come up with measures to assist teens overcome the phenomenon. All schools and parents would have to follow these measures in order to control the teens. With mandatory measures, teens will be forced to abide by the rules and may then resolve their FOMO problem.

The measures include:

- Time restrictions (only a maximum of 1 hour for unproductive usage at home, strict prohibition to use phones on school grounds for unnecessary use from 7am-2pm)

- Enhanced monitoring (parents regularly checking teens' phone usage, schools punishing students who do not comply with the rules)

- Confiscation of phones (for teens who do not abide by the rules, phones will be confiscated to help control the urge to go onto social media)

Research:

- Alice Marwick, co-director of Fordham University's McGannon Center for Communication Research, and Danah Boyd, a principal researcher at Microsoft Research New England, carried out a project that interviewed 165 teenagers across the country from varying socio-economic and ethnic backgrounds. One of their findings was that social media sites have become the modern day equivalent of hanging out at the mall or movie theater.

- Parents need to be more cautious when it comes to allowing their children to use mobile phones, said a report launched by the National Radiological Protection Board

- According to a report by Straits Times "most schools here impose strict rules on mobile phone usage in class, given that they can be a major source of distraction, and students may easily misuse phones for other purposes like circulating banned content in class."

Solution 4: A social platform to connect teens with councillors and other teens who are similarly affected by FOMO

We will try as much as possible for the Ministry of Educationto create a platform where teens can reach out to a higher authority who is an experienced councillor. The process is that the teens will fill up a form that includes their current conditions, together with their free times. Leveraging on AI's ability, it chooses two similar teens (who reached out via the platform) and a suitable councillor (who signed up in this platform) which later arranges a time to meet up in a common area. The conditions of the matchmaking

is the free time, the expertise of the councillors and the mental state of the teens.The councillor will engage in heart to heart conversations with the teens, at the same time allowing the teens to know each other better. It would be easier for the teens to open up because the teens experience similar problems pertaining to FOMO. The teens can relate to each other and have a better chance to get along well with each other. They can bond through this interaction. This can form many crucial relationships between teens that can be the cornerstone of the teens journey to overcome FOMO. The two main impacts are the talk by the councillor with the two teens and also the relationship as friends that can benefit the teens in the future.

Research:

- "In terms of our well-being, quality relationships trump quantity of possessions and experiences every time . . . investing time and energy in relationships . . . is a wonderful antidote to the compulsive activity that characterizes FOMO." a 2015 article written by Linda and Charlie Bloom states.

- Based on an article in Time magazine by Eric Baker, in an interview with Przybylski, he said "for people who feel very secure in their relationships, their relationships are important to them, but they don't feel compelled to always be connected".

Solution 5: AI companion

We will lobby tech companies to help us create an AI companion. The AI companion will be a virtual person-- a robot that can answer teens when they have questions, or even just respond to them as a friend. When teens are affected by FOMO, they need a form of companion. Although Artificial intelligence might not have feelings, they are a much convenient mode of companionship for these teens. Due to AI's large processing power, it would be easier to implement specific responses to each of the teen's problems. Whenever the teens feel like they need someone to talk to, these AI robots would always be ready to help them by giving them constructive advice.

Research:

- Based on a 2020 article written by Rushika Bhatia, "AI has huge potential as it helps improve customer self-service, enhance personalization and cater to individual customer requests and needs in a unique way."

- A 2018 report by Mckinsey Institute states that "alongside the economic benefits and challenges, AI will impact society in a positive way, as it helps tackle societal challenges ranging from health and nutrition to equality and inclusion. However, it is also creating pitfalls that will need to be addressed, including unintended

consequences and misuse."

STEP 4a. Select Criteria

Generate criteria to determine which solution idea does the best job of solving your Underlying Problem and/or addressing the Future Scene situation. Select the 5 most important criteria for measuring solution ideas and write them in the spaces provided.

<u>Criterion</u>

Criterion 1: Difficulty to execute- Which solution will be the easiest to implement?

Criterion 2: Acceptance of teenagers- Which solutions can cater to the teenagers so they would not have much objection?

Criterion 3: Effect in the long run- Which solutions can be sustained for the longest period of time?

Criterion 4: The range of impact- How many teenagers can be impacted?

Criterion 5: The depth of impact- Which solution is the most efficient that can impact the teenagers most in the shortest period of time?

STEP 4b. Apply Criteria

List the solution ideas from Step 3 on the grid. Use each criterion to rank the solutions on a scale from 1 (poorest) to 5 (best). The weighting for one important criterion may be doubled if necessary.

<u>Decision matrix</u>

Weighting: (out of 5)	Criterion 1: (2)	Criterion 2: (3)	Criterion 3: (5)	Criterion 4: (4)	Criterion 5: (1)	Total:
Website to spread awareness	5 x 2 = 10	3 x 3 = 9	1 x 5 = 5	5 x 4 = 20	1 x 1 = 1	45
Utilising algorithms	**2 x 2 = 4**	**4 x 3 = 12**	**4 x 5 = 20**	**3 x 4 = 12**	**4 x 1 = 4**	**<u>52</u>**
Mandatory measures	4 x 2 = 8	1 x 3 = 3	2 x 5 = 10	4 x 4 = 16	2 x 1 = 2	39
Social platform	3 x 2 = 6	2 x 3 = 6	5 x 5 = 25	2 x 4 = 8	5 x 1 = 5	50
AI companion	1 x 2 = 2	5 x 3 = 15	3 x 5 = 15	1 x 4 = 4	3 x 1 = 3	39

<u>Developing action plan</u>

We, the students, will lobby tech companies and will implement a "Finally over Missing

Out" app to help teens overcome the effects of FOMO. The application will have many functions to suit the sole purpose of alleviating the conditions of teens who are experiencing FOMO. Our derived solution utilises a curated lifestyle in order to solve the teen's problems. A curated life is "carefully choosing what you allow to shape your identity, atmosphere, relationships and sense of well-being. It is about realizing your worth and making choices that uphold your worth." If algorithms and big data can help in influencing decisions, it could help to do so positively.

Our key methods of helping teens lie in the functions of the apps. Firstly, we propose to use a schedule and time management to solve the problem. Time management is known to reduce stress for people. A curated life helps in reducing unfiltered information. Thus, curating a time schedule where teens fill in their daily schedule can help to organise their lives. Time efficiency can allow teens to also finish more activities on their plate, thus allowing them to participate in more activities.

Secondly, we propose to create a "AGO" system in the algorithm. AGO stands for aims, goals and objectives. If there was a goal set, teens can work towards the goal. Especially if it is written down, aims, goals and objectives can give teens a tangible "finish line" to work towards. If teens can realise what they want to accomplish for themselves, it can help them to cut down indulging in other people's lives, but instead concentrating on their own goals. At the same time, insteading of looking at people's accomplishments through a virtual window, they can strive for their own goals and experience that sense of accomplishment in real life.

Another function we propose is that in the algorithm, there is a system where after analysing what the teens are in favour of through their activities (in the schedule) and their history (on social media) Then, they can recommend activities these teens can engage in. Firstly, picking up an activity that one likes can increase his happiness. Another aspect is that teens can spend more time on the activities rather than getting distracted on social media, which could repeat the vicious cycle of FOMO. The activities will also be targeted with the motive of helping teens overcome FOMO. For example, the activities could be sports activities, volunteer work, reading etc. If teens really find their interests, basic tutorial videos will pop up in the algorithm to further ignite their interest. With the schedule, the algorithms could then add in these activities when these teens are free, organising the schedule so the teens can have every activity properly arranged.

Lastly, the algorithms can help to filter notifications. It will block out potentially distracting notifications selectively,especially from social media platforms. However the algorithms would not do so unreasonably. Some teens have concerns over keeping up with the times. The app can allow around an 30 minutes "grace period" where teens can freely use their phones. Other than blocking out potentially distracting notifications, it

can allow beneficial notifications, especially those related to education purposes. For example, teachers posting about assignments details is considered useful. We can leverage AI's decision making to selectively allow notifications to pop up. Managing notifications can also allow reminders from the algorithm itself. It can remind the teens of what they should be doing at what certain time period in order to better guarantee efficiency of workload.

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