Social Impact Assessment Report on the Idea Maker Program
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Author:
Chan Wai Ho, Tom

Acknowledgements

Idea Maker HK would like to express the deepest gratitude to the project officer of St. James' Settlement, parents, children who joined Idea Maker HK's STEM curriculums, and tutors of Idea Maker HK's cooperation in the interview and questionnaire survey, for the accomplishment of the SROI of the Idea Maker Program. Also, we would like to pay special thanks to Mr. Chan Wai Ho, Tom, with his team members Lillian Li, Yanice Wong and Amy Cheng, for their evaluation and contribution to the report.

We value the participation and feedback of the stakeholders in the SROI, and with the analysis, we have discovered a lot of entry points for improvement. We will keep improving the project and coordination pattern to increase social impacts, while hoping that the report can arouse public concern about the equal opportunity to learn new technologies, and innovation and apply it to society.

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Chief Executive Officer
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Executive Summary

Idea Maker Program is a social innovation project organised by Idea Maker HK to train underprivileged youth to become tutors to educate children about STEM knowledge. Part of their program will be especially organised for underprivileged children through collaboration with social service organisations in Hong Kong.

This report is to evaluate the social impact of the self-financing part of the Idea Maker Program generated by Idea Maker HK from 1 January 2021 to 31 December 2021 for their management's understanding of the impact of the program.

We adopted the Social Value Analysis methodology according to "A Guide to Social Return on Investment" (2012 edition) and used the "eight principles" as guiding principles throughout the assessment process.

During the assessment process, we engaged the stakeholders, understood the chain of events, and explored the outcomes of the program. We examined the relevancy and significance of each stakeholder and outcome, explored sub-groups, and determined well-defined outcomes. After that, we valued the social impact of the program by understanding its relative importance and establishing financial proxies of the outcomes. The social value of the program was calculated in both Social Return On Investment (monetized), and non-SROI (impact score) means. We verified the result with the stakeholders and sent the report to Social Value International for report assurance.

This assessment is limited by several factors. Due to COVID-19, no face-to-face interviews or focus groups were conducted in which on-verbal cues may not be captured. Moreover, the rigorous level was adjusted according to the scope, sample size, and budget of the assessment.

Through the assessment process, we concluded that the SROI of the project is 2.2, ranging from 1.3 to 3.2. In other words, Idea Maker HK invested HK$645,000 in the program and generated around HK$1.4 million in social and financial return, ranging from HK$ 856,657 to HK$ 2,093,615. The average impact score for the stakeholders is 3.9 on a 0-10 scale, showing a medium impact for the stakeholders on average.

The impact on children, parents, tutors, and staff was examined. In terms of impact distribution, 75% of the impact is generated for the youth tutors. The program could enhance the tutors' employability significantly, followed by improving self-esteem and increasing income. 14%, 9%, and 2% of the impact were generated for children, parents, and staff, respectively. For children and parents, it is noticeable that improving family relationships was an unintended outcome but deemed as the largest

impact for the children and parents.

In general, the assessment showed Idea Maker HK had achieved its original purpose of helping underprivileged youth to become STEM tutors. It is the first independent social impact report made for Idea Maker HK. We hope this assessment could assist Idea Maker HK in optimizing its social value based on decision-making that is timely and supported by appropriate accounting and reporting.

Chapter 1 Background of Idea Maker HK

Section 1 Introduction to the Program

Idea Maker HK was established in Hong Kong in 2013. They run social enterprise projects and are listed in the SE Directory published by the Social Enterprise Business Centre of the Hong Kong Council of Social Service. One of their missions is to provide "Science, Technology, Engineering, Mathematics (STEM)" training and employment opportunities for disadvantaged youth and children.

According to the report of the Education Bureau of the government of Hong Kong Special Administrative Region (HKSAR) in 2016 (EDB, 2016), STEM education is being promoted as a key emphasis in the ongoing renewal of the school curriculum. The report also highlighted STEM education is essential for lifelong learning that prepares students for the rapid economic, scientific, and technological development in the future. This policy direction kick-started the growing demands on STEM education. However, a survey study conducted by the Society for Community Organization in 2018 (SOCO, 2018) revealed that children from low-income families could not afford private tutorials and interest classes despite their needs and willingness to have one. Therefore, Idea Maker HK started a program in 2017, called the "Idea Maker Program" to provide STEM education to children no matter their economic backgrounds.

Riding on the demand for STEM education, Idea Maker HK primarily aims to tackle employment issues for underprivileged youth. According to the report of the Census and Statistics Department of the government of HKSAR in August 2021 (CSD, 2021), the unemployment rate of youth aged from 15 to 24 was 18.4%, significantly higher than that of 6.9% of the people aged over 25. Some youth social work practitioners and researchers (HKFYG, 2013) (MWYO, 2021) recommended that further career planning and training should be provided to unemployed young people to boost their

competitiveness in the job market and have better access to employment opportunities. In addressing the above problem, Idea Maker HK trained underprivileged youth who are interested in STEM to become the tutor of the Idea Maker Program. By gaining teaching knowledge, skills, and experience, some of the trained youth will be teaching assistants in schools.

Section 2 Scope

The purpose of this evaluation report is to evaluate the social impact of the self-financing part of the Idea Maker Program generated by Idea Maker HK from 1 January 2021 to 31 December 2021 for their management's understanding of the impact of the program. We examine the changes of the stakeholders covering individual, social, economic, and organisation aspects. Through collecting stakeholders' feedback, Idea Maker HK can understand its impact and thus review and improve its program. Considering the limited human, time, and financial resources for this assessment, we set a boundary within the below activities of the Idea Maker Program.

<u>Evaluated activities of the Program</u>

1. The program recruits and trains disadvantaged youth to become STEM tutors. The recruited youth will receive 20-hour basic STEM courses, on-the-job training, and coaching. Trained youngsters will assist in STEM classes for children. We aim to evaluate the social impact created by the training.
2. In the program, the children will learn about STEM through 10 STEM lessons. Some of the children's parents will join the classes with their children. We aim to evaluate the social impact generated through the classes.

We understand that Idea Maker HK also provided lots of other learning activities to students via schools and charities. However, those activities will not be covered in the assessment.

Chapter 2 Assessment Methodology

Section 1 Assessment Methodology

This report adopts the Social Value Analysis methodology according to "A Guide to Social Return on Investment" (2012 edition); hereinafter referred to as the Guide) and supplemental standards on principles published by the British government and Social Value International. The framework highlighted in the Guide is based on principles. The "eight principles" are shown in the below table.

Principles	Description
Engage Stakeholders	We are required to understand who experienced changes and how the outcome is measured and valued by engaging stakeholders throughout the assessment process.
Understand What Changes	We are required to articulate the theory of change, no matter it is positive, negative, intended, or unintended, through a chain of events experienced by stakeholders.
Value the Things that Matter	We are required to allocate limited resources to measure the outcomes in terms of the relative importance of stakeholders' preferences.
Only Include What is Material	We only include material information to give a true and fair picture to readers of the report.
Do Not Over-claim	We only claim the impact that is created by the evaluating activities.
Be Transparent	We show and discuss with stakeholders the basis, rationale, and limitations of the analysis.
Verify the Result	We are required to verify the result of the analysis with stakeholders and an independent assurance body.
Be Responsive	We pursue optimum Social Value based on decision-

	making that is timely and supported by appropriate accounting and reporting

Based on the above principles, the below six-stage procedures were carried out in this assessment.

Procedures	Description
1. Establishing scope and identifying key stakeholders	We discussed the scope of the assessment with the appointer and identified key stakeholders through their program plan. Baseline interviews were conducted to identify sub-groups or other key stakeholders within the scope of the evaluation.
2. Mapping outcomes	Through engaging with stakeholders and doing literature reviews, we developed an impact map that shows the relationship between inputs, outputs, and outcomes.
3. Evidencing outcomes and giving them a value	A set of questionnaires were designed after developing the corresponding outcome indicators. The relative importance (value) of outcomes was asked. Unintended outcomes were searched and evaluated in this stage.
4. Establishing impact	Having collected evidence on outcomes and valued them, those aspects of change that contributed from other impact factors (e.g., attribution, deadweight, displacement, and drop-off) were eliminated from consideration.
5. Calculating the social value	The valued impact, no matter positive or negative, was summed up and compared to the investment amount. A sensitivity test of the added impact was conducted.
6. Reporting and verification	The report was drafted and shared with stakeholders for the sake of transparency and verification

As the assessment is mainly for management evaluation purposes, the rigorous level of the assessment has been adjusted accordingly. Also, professional judgment was made based on the literature review, other comparable impact reports, and the assessor's field experience with the Idea Maker Program. The assessment limitations are explained in the following section.

Section 2 Assessment Limitations

There are several key limitations in this assessment. However, these limitations were addressed or mitigated through different means of the assessment or were accepted according to the rigorous level of assessment. The limitations are stated as follows.

First of all, the assessment involved collecting feedback from children who may not understand abstract concepts and present their feelings and changes accurately. We simplified the questionnaire in a way that children could understand, and we collected data from children's parents and tutors about their observations of children's behavioral changes.

The second limitation is the limited budget of the assessment. Convenience sampling was adopted in the assessment. Unlike random sampling, convenience sampling is a type of non-probability sampling that can lead to under-or over-representation of the population and biased results, especially when extrapolation to the whole stakeholder population was adopted in calculating the SROI. During the analysis process, we tried to detect data clusters and avoided the generalization of the population as a whole by determining any data segments. Moreover, $\pm$15% statistical error was taken in the calculation of the SROI, and a sensitivity analysis is conducted to increase the transparency of data. Probability sampling can be adopted if time, budget and situation allow.

Meanwhile, the assessment used post-tests to evaluate the magnitude of outcomes and impact factors. In a retrospective manner, Interviewees or respondents of the questionnaire may find it difficult to remember how they thought/ behaved before the start of the program. The amount of changes before and after the program may not be reflected accurately. Therefore, a large margin (15% of error) will be taken in the sensitivity analysis.

Moreover, this assessment used average figures on a scale to establish the amount of change experienced. There would be risk of over-generalizing the changes of stakeholders who experienced alternative outcomes. To avoid mixing up the changes of stakeholders who experienced different outcomes, sub-groups will be considered if over 10% of the survey reported a negative response or a neutral response for the majority of outcomes.

Finally, due to safety concerns under COVID-19, interviews were conducted mainly via online means such as zoom, phone calls, and google forms. Direct observations from the assessor were not conducted in the assessment. We could not capture non-verbal cues if the interviewee did not set up a face camera.

Chapter 3 SIA Evaluation and Analysis

Section 1 Stakeholders

I. Identifying and categorizing stakeholders

Based on the assessment scope and Idea Maker Program's activities, we identified the 1st batch of potential people who might experience material outcomes due to program either intentionally or unintentionally. After that, we conducted baseline interviews with the stakeholders through semi-structured interviews and phone surveys. In the interview process, we kept identifying other stakeholder groups that might experience material outcomes. We set open questions in the questionnaire and sent it out to the stakeholders 3 times to receive as much feedback as we could. Along the data collection and analysis process, we detected data clusters and avoided the generalization of any subgroup population. According to a social consensus research[1], if there is over 10% of population very committed to an idea, it may eventually become a prevailing opinion of the entire group. Therefore, in this assessment, over 10% alternative responds will be considered as the threshold of potential difference. In other words, if there is any potential differences detected in the quantitative stage (i.e. over 10% of the survey reported a negative respond or a neutral respond for the majority of outcomes), segmentation of stakeholders and forming subgroups will be further explored.

Through the above process, we identified the below stakeholder groups and subgroups:

Stakeholder	Included/ Excluded	Potential subgroups	Explanation of subgroup identification

[1] Social consensus through the influence of committed minorities – J. XIe,, S.Sreenivasan, G.Korniss, W.Zhang, C. Lim, and B.K. Szymanski (2011)

<u>Children</u> The main beneficiaries who attend the Idea Maker Program.	Included. They are the key stakeholders that participate in the activities of the program.	Junior-aged, K3 – P1 Middle-aged, P2 – P3 Senior-aged, P4 – P5	Through the baseline interview, we understood that in junior-aged classes, parents were required to join together with the children. Also, supported by the literature review [2], children's behavior can change rapidly when they grow. Hence, we initially categorize children's groups according to their age. However, after collecting more data from stakeholders, we found that many parents of middle to senior-aged children will sit in the class with their children, as the class is conducted online and it is very convenient for them to participate. In the quantitative stage, although we explored the possible segmentation of the group through the collected data set, no negative or neutral responds for the outcome was reported from potential sub-groups. In addition, the limited response rate in the quantitative survey did not support meaningful segmentation. Therefore, we considered all children who participated in the program as one stakeholder group.
<u>Children's Parents</u> The indirect beneficiaries of the program who are looking for interest classes for their children.	Included. They are the indirect beneficiaries of the program. The program designed some elements aiming to improve the family relationships of the children. Some parents also attended the program.	Low-income background Non-low-income background	There is possible that parents from low-income backgrounds were limited by insufficient resources and may experience different outcomes compared to their non-low-income counterparts. After collecting more data from stakeholders, we found no significant difference in the outcome between different income

[2] https://www.ncbi.nlm.nih.gov/books/NBK310550/

			level's families was observed. Moreover, in quantitative stage, no negative or neutral responds for the outcome was reported from potential sub-groups. However, It may be a result of the limited data set, which did not support meaningful segmentation. Therefore, we considered all parents who participated in the program as one stakeholder group.
<u>Young tutor</u> The main beneficiaries who receive education training and assist in the teaching of the children	Included. They are the key stakeholders that conduct or assist the teaching activities of the program.	Junior tutor Senior tutor	The tutor may experience different outcomes based on their seniority. They may have different experiences and expectations towards the program. After collecting more data from stakeholders, there is one tutor out of 19 tutors (5.2%) reported a neutral outcome in one of the three outcomes asked in the survey. As it is below the 10% threshold and he experienced positive outcomes in the other two outcomes. We considered it within the limit of forming sub-group. Therefore, a sub-group was not required.
<u>Idea Maker HK's program staff</u> The organiser of the program who provides training to the young tutors and organises interest classes for the children.	Included. They are the key stakeholders that conduct or assist the teaching activities of the program.	Not applicable	There are only 2 staffs involved in the program, and no significant difference in the outcome was identified. Moreover, in the quantitive stage, all staffs reported positively in all outcomes. Therefore, no sub-group is required.
<u>School teachers</u> The teachers of the children who may	Excluded. The curriculum of the program is not similar to the school teaching	Not applicable	Not applicable, as the group is excluded

have indirect benefits from reducing workload as the program help educate the children.	curriculum. Also, the scope of this assessment focused on the classes during the school vacation.		
<u>Other interest class providers</u> The competitor of the program.	Excluded. There were many interest class providers in the market, which Idea Maker may reduce their income. However, as Idea Maker Program was not dominating the market, our preliminary estimates of their impact on other interest class providers were very small. Also, Idea Maker Program is only one of the many competitors in the market, the contribution was very small and difficult to evaluate.	Not applicable	Not applicable, as the group is excluded

II. Number of Engaged Stakeholders

The below table summarizes the number of stakeholders engaged in the assessment. The qualitative phase involved the processes of identifying stakeholders and defining outcomes in which semi-structured interviews via phone were used. The quantitative phase involved the processes of collecting impact data and establishing the levels of attribution, drop-off, deadweight, and displacement of outcomes.

Stakeholders	Population	Qualitative Phase - Interviews	Quantitative phase - Questionnaire	Response rate
Students	158	1	4	3%
Parents	158	4	15	9%
Tutor	54	3	30	55%
Program staff	3	1	2	66%
Staff of partnered NGO	Not Available	1	Remarks: These stakeholder groups were excluded as no material outcomes were concluded after the	

School teacher	Not Available	1	interviews. However, the information provided by these stakeholders helped verify the project's impact.
School social worker	Not Available	1	

Section 2 Inputs and Outputs

I. Project Inputs

From 1 January 2021 to 31 December 2021, stakeholders inputted the below resources for the activities of the program

1. Funding input

Stakeholder	Item	Value (HKD)
Idea Maker HK	operating cost of the program, mainly the salary of tutors and salary of the staff with the material cost. Tutors' salary: $7500 X 54 Staff salary with the material cost: $10000 X 12 X 2 Although there were equipments such as 3D printers used in the activity, it was considered as sunk cost as they were bought for some years ago.	$645,000

2. Time input

Stakeholder	Item	Value (HKD)	Note
Parents	the time cost of joining the class	0	The assessment aims to evaluate the impact generated by Idea Maker HK. The impact contributed by other parties (e.g. parents and children) were taken out through the calculation of the attribution. Therefore, the time cost is taken out correspondingly.
Children	the time cost of joining the	0	

	class		
Tutor	time cost	0	The time cost of the tutor has already been calculated by the salary given by Idea Maker HK. The value is taken to be zero to avoid double counting the input.

II. Project Outputs

From 1 January 2021 to 31 December 2021,

Activity	Quantity
Tutor training	54 Persons 20 hours of training per tutor
Children's class	158 Persons 10 classes per person
Activity income	HK$316,000 ($200 X 10 X 158)

Section 3 Outcomes and Indicators

I. Defining Outcomes

We decided the outcomes of stakeholders' outcomes through direct stakeholder involvement, third-party research, and the assessor's field study by following the development of Idea Maker HK in 2017. We also took reference to other social impact assessment reports of similar activities and stakeholder groups. Possible outcomes shown in other reports with similar activity nature and targeted stakeholder groups were selected based on the assessor's field study and checked with the stakeholders during the interviews and surveys.

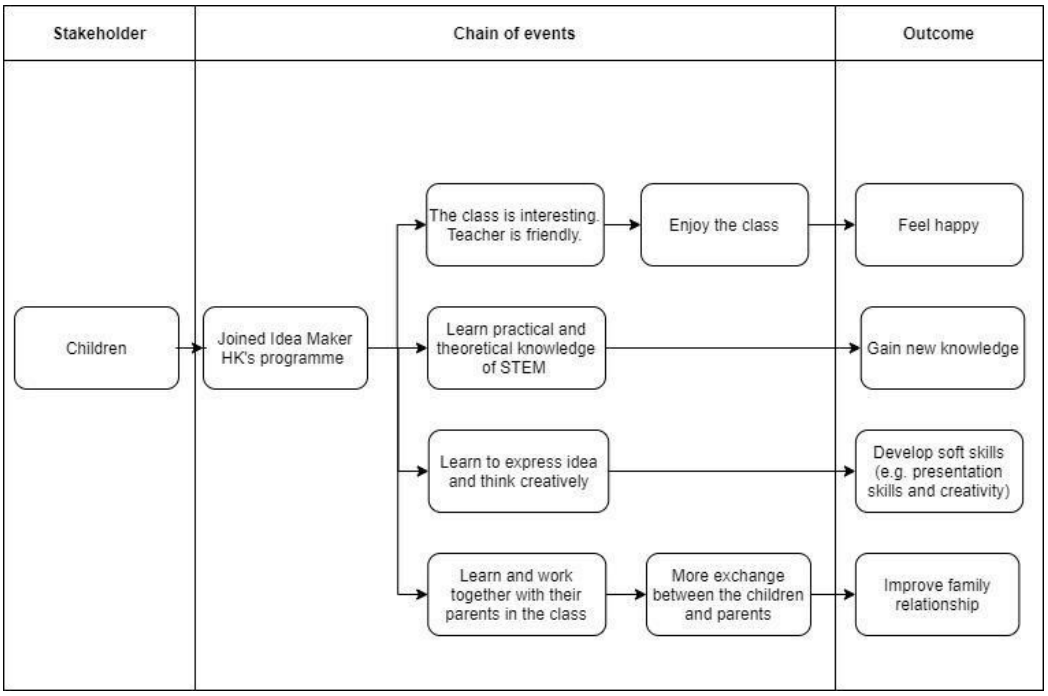
Semi-structured interviews were adopted, and open questions were used in the direct stakeholder involvement to detect any unintended outcomes. Especially, stakeholder will be asked whether they experienced a negative or neutral outcome in the interview. As it was not feasible and practical to interview all stakeholders one by one, an open question was also set In the quantitative survey to receive response of other outcomes experienced by the stakeholders not showing in the questionnaire. By using the above

approaches, we tried to explore all relevant outcomes and construct the theory of change and the chain of events experienced by the stakeholders.

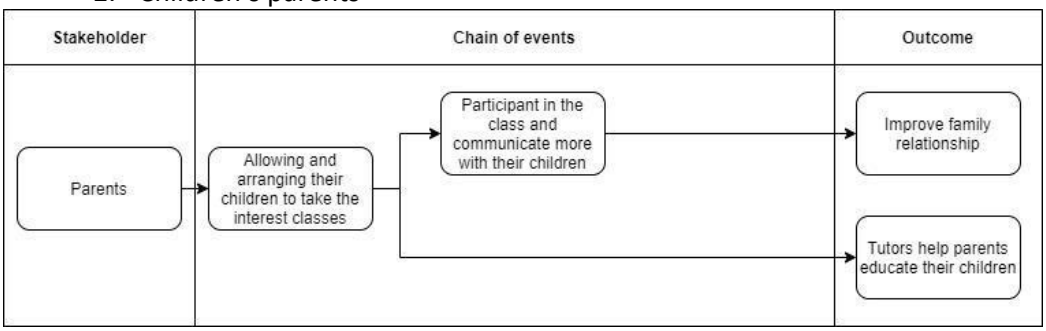
II. Theory of Change and Chain of Events

Through the above engagement processes, we drew the chain of events on each stakeholder as follows. If there were negative or neutral outcomes detected in the qualitative and quantitative stages over the 10% threshold, it would be shown in the chain of events in red.

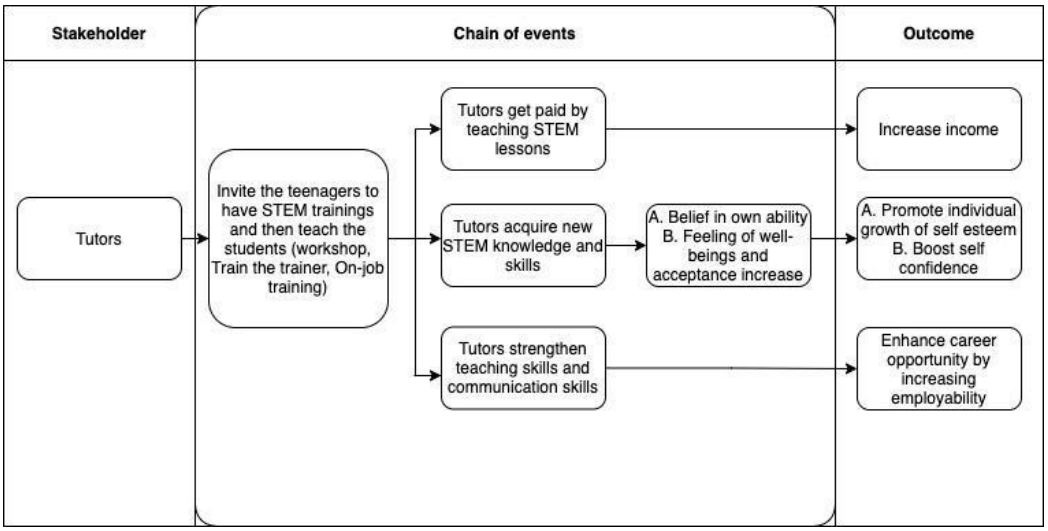
1. Children



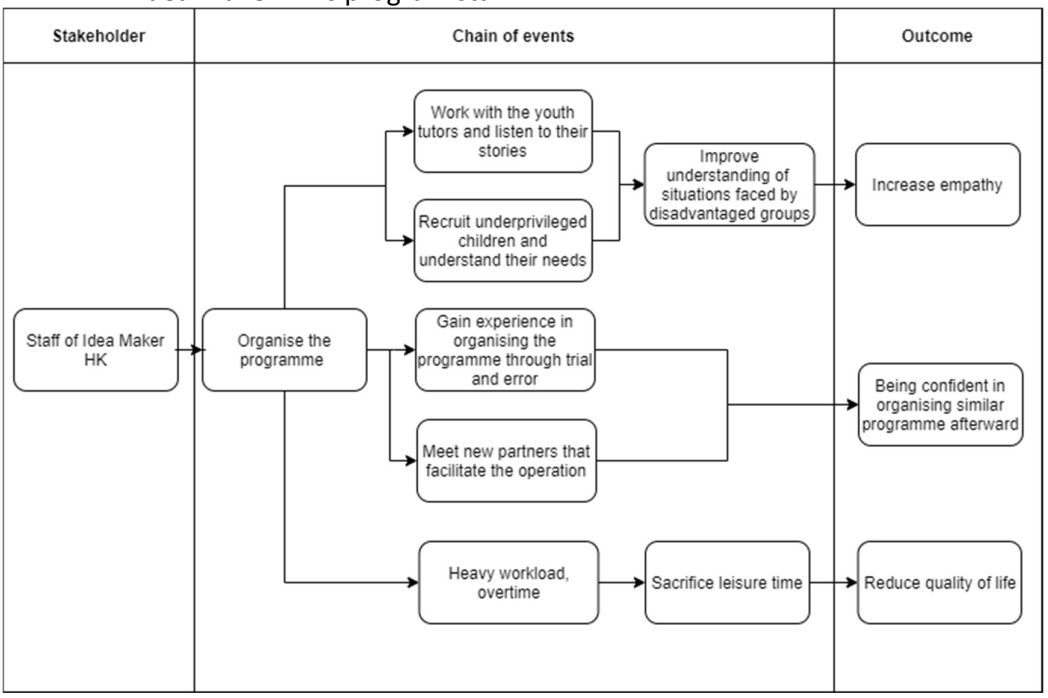
2. Children's parents



3. Tutor



4. Idea Maker HK's program staff



III. Materiality Judgements of the Outcomes

In accordance with the principle of " Only Include What is Material", a materiality judgment was conducted so that the report would focus on relevant and significant outcomes of the stakeholders. The relevance of outcomes was achieved by conducting baseline interviews with the stakeholders. We tried to reach the "saturation point of outcomes" by interviewing as many interviewees as we could in a stakeholder group. Meanwhile, we determine the significance of outcomes through the qualitative survey. A significant outcome shall influence the decision-making and actions of stakeholders. The result of the survey facilitated our understanding of how much change had occurred.

1. Children

Outcome	Included/ Excluded
Feel Happy	**Included.** Based on the interviews with Idea Maker HK, parents, tutors, and the children, the program is an edutainment for the children to have fun, and learn STEM knowledge and various soft skills simultaneously.
Gain new knowledge	
Develop soft skills	
Improve family relationship	**Included.** Parents were encouraged to participate in the activities together with their children. Based on the interviews with the parents, they learned together with their children, and the family relationship was improved through the activities in the program.

2. Children's parents

Outcome	Included/ Excluded
Improve parent's ability to educate their children	**Excluded.** The assessment would only count the number of pairs of relationship that experience a change. We will use "family" as the unit to articulate the change of this outcome. To avoid double-counting the outcome, we exclude this outcome.
Improved family relationship	**Included.** Parents were encouraged to participate in the activities together with their children. Based on the interviews with the parents, they learned together with their children, and the family relationship was improved through the activities in the program.
Cost saving	**Excluded.** Although one of the objectives of the program is to let underprivileged families enjoy STEM education at a lower cost, in the self-finance classes, the cost saving for the participating families is 6.5% off, which is not significant compared to the subsidized program operating with schools and charities.

One of the interviewees said, "Before I joined parent-child class provided by Idea Maker, I had no idea about STEM experiments, but Idea Maker's tutor assisted in answering my children's questions about STEM."

3. Tutor

Outcome	Included/ Excluded
Increase Income	**Included.** Through the interviews with Idea Maker HK and the tutors, the program targeted to train youth with lower education levels to become STEM tutors. Not only does it create employment opportunities for the youth to continue working in the education industry, but the program also aims to boost their self-esteem and employability.
Boost self-esteem and self-confidence	
Improved employability	

One tutor of the 19 responses replied in the survey that he/she didn't observe any improvement in terms of self-esteem, self-confidence, and working ability but reported an increase in income and career opportunities. The data reflected that this tutor might be an experienced tutor in the area of STEM. The tutor also commented that the program might be more useful to tutors who have little experience. However, no unintended negative outcome caused by the program to this tutor was observed. Regarding the above situation (i..e less than 10% of the stakeholders reported alternative responds in the majority of outcomes.) and being limited by resources, sub-groups were not applied to this case.

4. Idea Maker HK's program staff

Outcome	Included/ Excluded
Increase empathy	**Included.** After interviewing the staff and collecting the data from the questionnaire, we understood that the program staff became more aware of the poverty problem in Hong Kong and increased their empathy toward the underprivileged. They also became more skillful in organising similar programs in the future by gaining more experience.
Being confident in organising similar programs afterward	
Reduce the quality of life	**Excluded.** After interviewing the staff and collecting the data from the questionnaire, no such outcome was observed.

An interviewee responded, "I have more confidence in organizing similar educational programs as we have more knowledge, skills, and experiences of it such as course design, agenda-setting, recruitment, venue finding, financial planning, etc.".

IV. Indicators of Outcomes

To demonstrate the significance of an outcome, we adopt the below scale to

understand the extent of change experienced by the stakeholders. When the average weighting following the below calculation is 50% or higher, it indicates that, on average, all interviewees/ respondents agreed to the change and/or the changes often happened. In connection with the rationale shown in section III above, we will deem the outcome significant and include the outcome.

Through interviews with the stakeholders, we designed the below indicators in the quantitative surveys to measure the degree of change of each outcome experienced by the stakeholders. Two types of 5-point scales were widely adopted in the survey. When we would like to investigate whether there were unintended opposite (negative) outcomes, we would apply the Likert scale, which consists of 5 points from strongly disagree, disagree, neutral, agree to strongly agree. We weighted the scale as follows:

Scale (Exact wordings will be adjusted according to the question type)	Amount of change
Strongly agree	100%
Agree	50%
Neutral	0%
Disagree	-50%
Strongly disagree	-100%

When we believe that there was no intended outcome, we will apply another scale in order to understand more the extent of change of the outcomes. We paid attention in case there were many replies reporting that the outcome never happened. It may indicate that further investigations are required. We weighted the scale as follows:

Type 2 Scale (Exact wordings will be adjusted according to the question type)	Amount of change
Always	100%
Usually	75%
Often	50%

Sometimes	25%
Never	0%

As all program activities had been completed before the impact assessment started, stakeholders were required to complete the questionnaire retrospectively. Thus, no pre-test was conducted. Further discussion can be located in Section II: Assessment Limitations.

The outcome, indicator, amount of change, and duration of the program are summarized in the below table.

Stakeholder	Outcome	Indicator	Amount of change (depth)	Drop-off
Children	Feel Happy	5-point Likert scale on the happiness of the class reported by children and observed by parents	(87.5% +90%)/2 =88.8%	100%[3]
	Gain new knowledge	Average of 5-point Likert scale on 2 dimensions of knowledge (STEM knowledge, other knowledge) reported by children and observed by tutors and parents	(87.5% +81.4%+80 %)/3 =83%	12.5%
	Develop soft skills	Average of 5-point Likert scale on 4 dimensions of knowledge (creative thinking, problem-solving, communication skills, and attention) reported by children, tutors, and parents	(87.5%+79. 4%+80%)/3 =82.3%	38.5%

[3] This outcome happened during the period of activities.

	Improve family relationship	Average of 5-point scale reported by the parent and children	(87.5%+85 %)/2 = 86.3%	100%
Children's parents	Improve parent's ability to educate their children	5-point Likert scale on 2 dimensions (STEM knowledge, other knowledge, social return on investment)of knowledge reported by parents	(86%+67%+ 72%+67%+ 64%+72%)/ = 68.8%	100%[4]
Tutor	Increase Income	Average increase in income compared with the previous period reported by the tutor 5-point Likert scale on the satisfaction of the income reported by the tutor	$7500 55%	100%[8]
	Boost self-esteem and self-confidence	Average of - 4-point scale on the increment of self-esteem and confidence reported by the tutor and - A simplified Rosenberg self-esteem scale	(74%+46%) /2 = 60%	100%[8]
	Improved employability	The average score of increased career opportunity and working ability	(63%+68%) /2=65.5%	57%
Idea Maker's program staff	Increase empathy	5-point Likert scale on the change of empathy	50%	50%

[4]According to the Ebbinghaus' forgetting curve in psychology, people will almost forget a knowledge if there is no repetition of learning. Murre, Jaap M. J.; Dros, Joeri (2015). "Replication and Analysis of Ebbinghaus' Forgetting Curve"

		reported by staff		
	Being confident in organising similar programs afterward	5-point Likert scale on the change of confidence reported by staff	75%	62.5%

Chapter 4 Value Calculation

Section 1 Valuing Outcome

1. Relative importance of outcomes

Instead of using the Social Return on Investment (SROI) approach, which requires monetizing the value of outcomes, this assessment evaluated the relative importance of outcomes of the stakeholders. To value the outcomes, we asked the stakeholders in the survey to rate the relative importance of each outcome from their own perspective on a unipolar equal weighting scale from zero (not important at all) to ten (extremely important).

2. Valuation process

Calculating SROI requires adoption of financial proxies to different outcomes. The assessor needs to select the most appropriate valuation approach or combination of approaches according to the audience and purpose of the valuation and the required level of rigour. As using different financial proxies may create a significant difference in the SROI calculation. It is required by the Guide that the assessor needs to discuss the adopted valuation approaches and conduct appropriate sensitivity analysis by applying different valuation assumptions and identify risk in the data to provide sufficient confidence in the valuation.

After establishing the financial value of the outcomes, the assessor also need to verify the result with stakeholders, doing internal quality control and/or seek assurance (e..g peer review and external independent assurance). Any professional judgements made in the valuation process should be disclosed in full transparency in the report.

3. Valuation approach

The following monetary approaches and secondary valuation approaches were considered in the assessment.

Cost-based approaches:
It calculates market trade-offs (or cost avoided) associated with maintaining a change in an outcome. For example, professional judgement will be made on the replacement cost, opportunity cost and potential cost saving related to an outcome.

Revealed Preference:
It benchmarks other substitute goods or services that could provide a similar change. For example, we will ask whether there is something in the marketplace that may bring similar changes if the stakeholders do not join the program.

Stated Preference:
It directly asks the stakeholder how much they are willing to pay for a positive outcome or pay to avoid a negative outcome.

Anchoring:
When there is already an established monetary value of an outcome and that outcome is weighted with other non-monetized outcome (e.g. by obtaining the relative importance of the outcomes by stakeholders), we can use the established monetary value to estimate other non-monetized outcome. This approach was used when stakeholders is hard to value some outcomes (e.g. happilness or family relationship) by other valuation approaches.

A summary of relative importance of the outcomes is shown as follows.

Outcomes	Financial value	Relative importance (0 to 10 marks)	Rationale/ Feedback from stakeholders
Children			
Feel Happy	$1216	8.75	Anchoring is used in this valuation, as stakeholder can comfortably compare the relative importance of this outcome with "gaining new knowledge and soft skills". The financial value is calculated by the relative importance of "Gain new knowledge" ($1320/9.5 x 8.75 = 1216)
Gain new	$1320	9.5	Revealed preference is used in

knowledge			this valuation, as it is easier for stakeholder to compare the outcome of this program to other available substitute in the market. It is believed that similar learning objectives could be achieved through other STEM interest classes. We searched the cost of a STEM interest class in Hong Kong is around $1320 per course.
Develop soft skills		9.5	
Improve family relationship	$1355	9.75	Anchoring is used in this valuation, as stakeholder can comfortably compare the relative importance of this outcome with "gaining new knowledge and soft skills". The financial value is calculated by the relative importance of "Gain new knowledge"
Parents			
Improve parent's ability to educate their children	$500 per course	8.4	Revealed preference is used in this valuation, as the parent stated that joining a playgroup may provide similar outcomes. For example, they can learn how to communicate and play with their children. The financial proxy is taken to be the course fee of a playgroup
Tutor			
Increase Income	$13637	7.47	The tutors provided the average increased income. The reported average increase of income generated through the program ($7500/55% = $13637)

Boost self-esteem and self-confidence	$12304	6.74	Anchoring is used in this valuation, as stakeholder can comfortably compare the relative importance of this outcome with "increase income". The financial value is calculated by the relative importance reported by the tutor. ($13637/7.47 x 6.74) = $12304
Improved employability	$13746	7.53	Anchoring is used in this valuation, as stakeholder can comfortably compare the relative importance of this outcome with "increase income". The financial value is calculated by the relative importance reported by the tutor. ($13600/7.47 x 7.53) = $13746
Idea Maker's program staff			
Increase empathy	$4688	7.5	Anchoring is used in this valuation, as stakeholder can comfortably compare the relative importance of this outcome with "being confident in organizing similar programs afterward". The financial value is calculated by the relative importance reported by the tutor ($5000/8 x7.5) = $4688
Being confident in organising similar programs afterward	$5000	8	Cost-based approach is used in this valuation, as Idea Maker thought the program was indeed an on-job training to their staff that can replace other staff training program. The cost of a training program

			for charity management

4. Impact factors

According to the Guide, impact factors had to be examined in the assessment to avoid over-claiming the program's impact. There are four dimensions of the impact factors as described in the below table. As drop-off factors were discussed in section V of chapter 4, this section will mainly focus on the factors of attribution, deadweight, and displacement.

Impact factor	Description
Attribution	The proportion of the change in the outcome that is caused by the contribution of other organisations and people. This factor is calculated by the weighted average of the stakeholder replies in the questionnaire.
Deadweight	The proportion of the change in the outcome that will happen to stakeholders anyway without the project. This factor is calculated by the weighted average of the stakeholder replies in the questionnaire.
Displacement	The proportion of the change in the outcome that displaces other outcomes. For example, we consider if the project prevents people from experiencing the same outcomes or shifting the negative outcomes somewhere or to someone else. This factor is calculated by the weighted average of the stakeholder replies in the questionnaire.
Drop-off	The proportion of the change in the outcome that deteriorates over time. This factor is calculated by the weighted average of the stakeholder replies in the questionnaire.

Duration

From the survey result and interviews, all of the outcomes started during the period of activities. Therefore, we value the outcome from the year-start. To avoid overclaiming the outcome, we will only consider the outcome within 3 years if the outcome lasts after the activities end.

Adopted Scale for Drop-off rate

In the questionnaire, we asked about the chance of lasting the outcomes for one year on a 5-point Likert scale. We calculate the drop-off as the average chance of losing the outcome after 1 year. (i.e. 1 – chance of lasting the outcome) We converted the chance which the outcome can last after 1 year as below:

Scale	Chance of lasting the outcome after 1 year

Very likely	100%
Likely	75%
half-half	50%
Unlikely	25%
Very unlikely	0%

1. Children

Impact Factor	Outcome	Percentage	Description
Attribution	Feel happy	10%	Although the STEM program is 100% designed and taught by Idea Maker HK which they are fully attributed to the outcome, it is considered that the stakeholder also took effort to achieve the outcome. Therefore, 10% attribution rate is set to account for other external factors.
	Gain new knowledge		
	Develop soft skills		
	Improve family relationships		
Deadweight	Feel happy	(83.3% (Children) + 92.5%(Parents))/2= 87.9%	Through the interview with children and parents, we asked how frequently the children feel happy in daily life (i.e., by participating in other activities). The survey result indicated that 87.9% of the children probably would feel happy anyway without joining the program.
	Gain new knowledge	92.5%	When we asked the children's parents whether they would arrange similar programs for their children if they didn't know Idea Maker HK, 92.5% replied they would find a replacement course.

	Develop soft skills	92.5%	When we asked the children's parents whether they would arrange similar programs for their children if they didn't know Idea Maker HK, 92.5% replied they would find a replacement course.
	Improve family relationships	50%	Family relationships are likely to improve through daily interaction. We asked the children how likely the change would occur without the program. 50% of the respondents replied that family relationships would increase anyway.
Displacement	Feel happy	0%	There is no trivial or observable evidence that the program would prevent other people from experiencing this outcome from the program.
	Gain new knowledge		
	Develop soft skills		
	Improve family relationships		

2. Children's parents

Impact Factor	Outcome	%	Description
Attribution	Improve parents' ability to educate their children	10%	Although the STEM program is 100% designed and taught by Idea Maker HK which they are fully attributed to the outcome, it is considered that the stakeholder also took effort to achieve the outcome. Therefore, 10% attribution rate is set to account for other external factors.
Deadweight		15%	We asked whether parents would arrange similar programs for themselves to improve their STEM

			knowledge and soft skills so that they can educate their children by themselves. Only 15% replied that they would do it anyway without the program.
Displacement		0%	There is no trivial or observable evidence that the program would prevent other people from experiencing this outcome from the program.

3. Tutor

Impact Factor	Outcome	%	Description
Attribution	Increase Income	10%	Although the STEM program is 100% designed and taught by Idea Maker HK which they are fully attributed to the outcome, it is considered that the stakeholder also took effort to achieve the outcome. Therefore, 10% attribution rate is set to account for other external factors.
	Boost self-esteem and self-confidence		
	Increase career opportunity		
	Increase working ability		
Deadweight	Increase Income	61%	The tutor may look for a part-time job with a similar salary as an alternative. According to the survey result, there is a 61% of chance that the tutor will earn a similar wage anyway without the program.
	Boost self-esteem and self-confidence	58%	The tutor may obtain similar outcomes by other means without the program. According to the survey result, there is a 58% of chance that the tutor will find a way to obtain similar outcomes without the program.
	Increase career opportunity	53%	The tutor may still get a job, including non-education related, without the

			program. According to the survey result, there is a 53% of chance that the tutor will find a way to obtain a job anyway without the program.
	Increase working ability	26%	The tutor may learn teaching skills that increase their working ability by other means without the program. According to the survey result, there is a 26% of chance that the tutor will find a way to obtain similar outcomes without the program.
Displacement	Increase Income	0%	There is no trivial or observable evidence that the program would prevent other people from experiencing this outcome from the program.
	Boost self-esteem and self-confidence	0%	
	Increase career opportunity	0%	As the career options and demand in the education industry are huge, there is no evidence that Idea Maker HK will reduce the career opportunities of the people who didn't join as a tutor of the program. Indeed the program is providing equal opportunities for underprivileged tutors who probably cannot get access to jobs in the education industry.
	Increase working ability	0%	

4. Idea Maker HK's program staff

Impact Factor	Outcome	%	Description
Attribution	Increase empathy	10%	Although the STEM program is 100% designed and taught by Idea Maker HK which they are fully attributed to the outcome, it is considered that the stakeholder also took effort to achieve the outcome. Therefore, 10% attribution rate is set to account for other external factors.
	Being confident in organising similar programs afterward		

Deadweight	Increase empathy	37.5 %	The staff may increase their empathy through other means, e.g., participating in other volunteering activities without the program. According to the survey result, there is a 37.5% of chance that the staff will find a way to obtain similar outcomes without the program.
	Being confident in organising similar programs afterward	37.5 %	The staff may become more confident by organising other programs in order to have similar experiences. According to the survey result, there is a 37.5% of chance that the staff will obtain similar outcomes without the program.
Displacement	Increase empathy	0%	There is no trivial or observable evidence that the program would prevent other people from experiencing this outcome from the program.
	Being confident in organising similar programs afterward	0%	

5. Impact Calculation

The impact is calculated by two approaches (1) using the monetized social value and (2) using the relative importance.

<u>Monetized Social Impact</u>

The net social value of an outcome (i.e., outcome i) created by the program equals to:

$$Monetised\ SV_i = N_i \times \Delta_i\% \times FP_i \times Impact\ factor_i$$

Given that
SV_i : Social value of outcome i
N_i: Number of stakeholders experienced outcome i
Δ_i%: Amount of change/ depth experienced by the stakeholder
FP_i: Financial proxy of the outcome i

In which,

$$Impact\ factor_i = (1 - Deadweight_i) \times (1 - Displacement_i) \times (1 - Attribution\ rate_i)$$

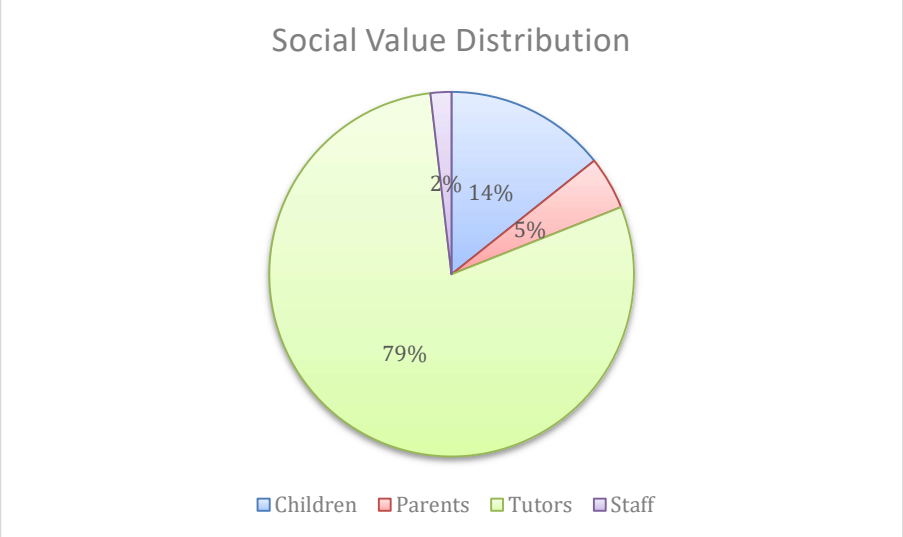
The total social value of the program is calculated by summation of all net social value of the outcomes created by the program through the duration (D) of the program:

$$Total\ Social\ Value\ = \sum_{n=0}^{D} \sum_{i} SV_i \times (Drop\ off\ rate)_i^{\,n}$$

i	Outcome	Monetized Social Value					
		Year 0	Year 1	Year 2	Year 3	Total	%
Children							
1	Feel Happy	$18579	$0	$0	$0	$18579	2%
2	Gain new knowledge	$5842	$5112	$4473	$3914	$19341	2%
3	Develop soft skills	$5793	$3563	$2191	$1348	$12894	1%
4	Improve family relationship	$83142	$0	$0	$0	$83142	9%
Children's parents							
5	Improve parent's ability to educate their children	$43906	$0	$0	$0	$43906	5%
Tutor							
6	Increase Income	$142155	$0	$0	$0	$142155	15%
7	Boost self-esteem	$150687	$0	$0	$0	$150687	16%

	and self-confidence						
8	Improved employability	$264732	$113835	$48949	$21048	$448563	48%
Idea Maker's program staff							
9	Increase empathy	$3956	$1978	$989	$494	$7417	1%
10	Being confident in organising similar programs afterward	$6328	$2373	$890	$334	$9925	1%
Present value of the monetized social value							
Discount rate = 3.5%		$725,119	$122,570	$53,669	$24,477	$925,835	100 %

Through the above analysis, here is the distribution of social value to the stakeholders.



It showed that tutors were the primary beneficiaries in this program, significantly higher than other stakeholders. It is because the tutors reported that they probably could not achieve similar outcomes without the program. They deemed the program had helped them to improve their employability,

and such experience could last for years after the completion of the program.

Social Return on Investment (SROI)
The financial return and social return of the program:

HK$ 1,239,835

By using the below formula,

$$SROI = \frac{Financial\ return + Monetized\ social\ return}{Total\ investment}$$

$$= 1.9$$

which means that with one dollar of investment, the program can create 1.9 dollars in financial and social return.

Impact Score

For Non-SROI calculation, we can calculate the social value created by the impact score based on the relative importance (RI) of the outcome. The calculation is shown by the below formula.

$$Impact\ Score_i = \Delta_i\% \times RI_i \times Impact\ factor_i$$

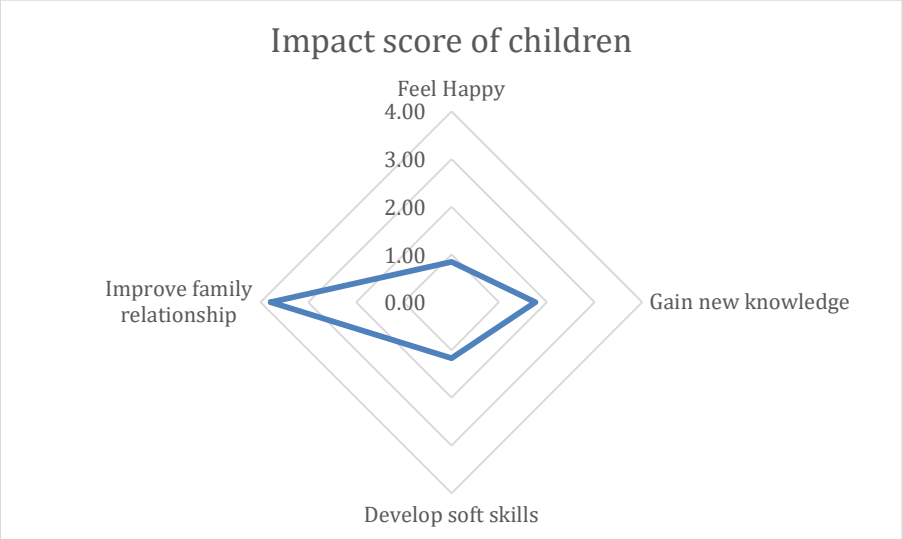
whereas

$$Total\ Impact\ Score = \sum_{n=0}^{D} \sum_{i} Impact\ Score_i \times (Drop\ off\ rate)_i^n$$

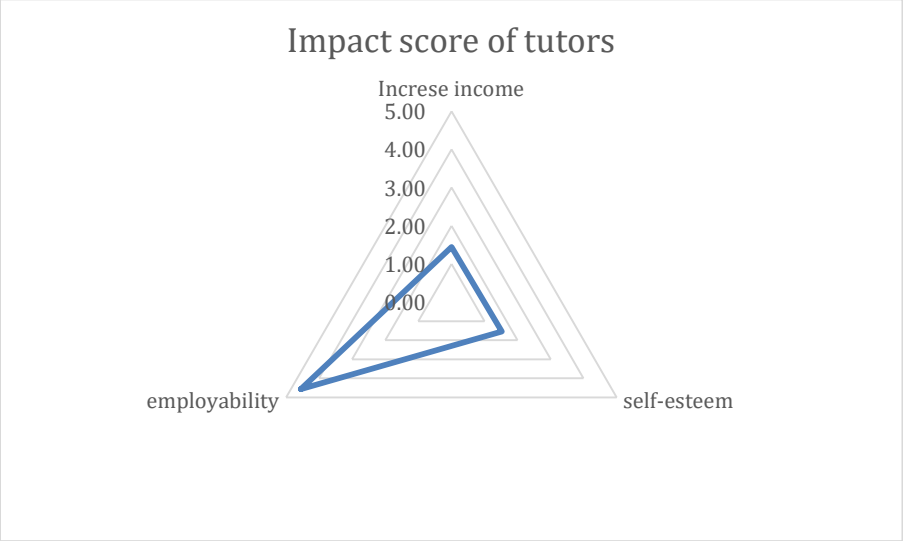
i	Outcome	Impact Score
Children		
1	Feel Happy	0.9
2	Gain new knowledge	1.8
3	Develop soft skills	1.2
4	Improve family relationship	3.8
Sub-total		7.6

Average		1.9
Children's parents		
5	Improve parent's ability to educate their children	5.2
Sub-total		5.2
Tutor		
6	Increase Income	1.4
7	Boost self-esteem and self-confidence	1.5
8	Improved employability	4.6
Sub-total		7.5
Average		2.5
Idea Maker's program staff		
9	Increase empathy	4.0
10	Being confident in organising similar programs afterward	5.3
Sub-total		9.3
Average		4.7
Total		**29.0**
Stakeholder's average score		**(1.9+5.2+2.5+4.7)/4 = 3.6**

Through the impact score analysis, we can understand the particular impact on the stakeholders. For the children, improving family relationships had the highest impact score, followed by gaining new knowledge, soft skills, and feeling happy. It is a bit unexpected that although the program was not positioned as a family activity, it did have some elements to foster the exchange between the children and their parents. It is shown that they treasured such exchange in the program, so this outcome scored higher than other outcomes.



For the tutors, it is shown that the program generated most of the impact in the area of employability. It may be because the program sometimes could work with the primary school in which the tutors could not gain such experience in private tutoring.



Section 2 Sensitivity Analysis

As the assessment involves statistical analysis and professional judgment throughout the whole assessment process, it is more appropriate to present the social value in terms of a range, no matter using SROI and Non-SROI approaches. This section will examine the result of impact calculation if various scenarios are taken into consideration.

Sensitivity is calculated using this formula:

$$Sensitivity\ (S) = \frac{Resultant\ Percentage\ Chan\quad of\ SROI\ due\ to\ the\ factor}{Percentage\ Change\ of\ the\ factor}$$

In this assessment, we considered that the sensitivity of a factor lower than 0.3 is low sensitivity, which means that a small change in that factor does not change the SROI much. We examined the sensitivity of the following factors:

1. Depth of change:

As the sample size was below 30 and convenience sampling was adopted in the survey, we cannot calculate the confidence intervals of the social value calculated in the above section. In this case, we assume $\pm$15% statistical error for measuring the percentage of change caused by the program.

Factor	Resultant SROI	Sensitivity (S)
+ 15% statistical error	2.2	1
- 15% statistical error	1.7	-1

2. Attribution:

The attribution factor is taken to be 10% as the STEM program is mostly contributed by Idea Maker HK. We assumed the self-learning skill of children was less significant and their parents didn't attribute it to the children's learning in the program. In this case, we assume 30% attribution from the children's self-learning and parents' guidance.

For the improved family relationship between children and parents, we assume 50% attribution from the children and parents themselves.

Moreover, we assume 30% attribution for the tutor to increase their self-esteem due to their self-learning.

Outcome	New Attribution	$\Delta\%$	Resultant SROI	Sensitivity (S)
Children				
Gain new knowledge	30%	+20%	1.9	-0.02
Develop soft skills	30%	+20%	1.9	-0.01
Improve family relationship	50%	+40%	1.9	-0.07
Tutor				
Increase Income	30%	+20%	1.9	-0.13

Boost self-esteem and self-confidence	30%	+20%	1.9	-0.13
Improved employability	30%	+20%	1.8	-0.35

3. Deadweight:

±15% statistical error is taken for measuring the deadweight of the program.

Factor	Resultant SROI	Sensitivity (S)
+ 15% statistical error	2.2	-1
- 15% statistical error	1.7	1

4. Drop-off:

±15% statistical error is taken for measuring the drop-off of the program. Meanwhile, although the program is for educational purposes by nature, which in the founder's view that they create a longer term impact on the children, parent and tutor, we took the drop-off case in some of the outcomes to be 100% as we believe there are many factors affecting and contributing to the growth of the stakeholders in the long run. In order to address the longer term learning effect after the program, we consider a 50% drop-off rate of the below-listed outcomes for up to 3 years after the program in the sensitivity analysis.

On the other hand, 57% of tutor reported the experience and skills learned through the programme keep relevant and can improve their employability after 1 year. In the sensitivity test, we assume the drop-off rate increased to 100% which means that the experience and skills don't last after the programme.

Outcome	New Drop-off rate	Δ%	Resultant SROI	Sensitivity (S)
Parents				
Improve parent's ability to educate their children	50%	-50%	2.0	0.06
Tutor				
Boost self-esteem and self-confidence	50%	-50%	2.1	0.21
Improved employability	100%	+43%	1.7	-0.34

5. Relative importance

±15% statistical error is taken for measuring the relative importance of the outcomes.

Factor	Resultant SROI	Sensitivity (S)
+ 15% statistical error	2.2	1
- 15% statistical error	1.7	-1

6. Financial proxy

The monetized social value is calculated based on the value of the financial proxy. Therefore, there could be a significant effect on the monetized social value if a different proxy is adopted.

Financial proxy	Lower value	Resultant SROI	Higher value	Resultant SROI	Sensitivity (S)
Children It is assumed the price of a STEM program can be ranged from HK$800 – HK$2000 per course.					
Gain new knowledge	$800	1.9	$2000	2	0.03
Develop soft skills					
Children's parents The parenting course provided by tertiary education institutions can be up to $2500 per course.					
Improve parent's ability to educate their children	$500	1.9	$2500	2.2	0.04
Tutor We used anchoring approach of the earned salary to evaluate the financial value of the other two outcomes experience. If we don't use anchoring approach, we may consider that there may be similar outcome by taking a teacher training course. A professional teacher training course would cost $1000 - $2000 per hour. As the programem provide 20 hours of training, it would cost $20000 - $40000 and $10000 - $20000 per outcome.					

Boost self-esteem and self-confidence	$10000	1.9	$20000	2.1	0.10
Improved employability	$10000	1.8	$20000	2.3	0.36
Staff We assume that it takes 100 hours for the staff to master the skills of 42rganizing similar programs through on-job- training and given that the staff works 44 hours per week, the salary equivalent would be around $11,500 if the monthly salary of the staff is $20,000					
Being confident in 42rganizing similar programs afterward	$5000	1.9	$11500	2.0	0.01

Summary of the sensitivity analysis:

From the above analysis, the range of SROI is from 1.7 to 2.3 for single changes of the factors. It is shown that 2 factors are subject to higher sensitivity (S>0.3) which may cause relatively large errors in the SROI calculation, which users of this report shall may cautious:

1. Statistical errors of the different impact factors and outcomes (S =1/-1))
2. The outcome "Improved employability" of the tutor

For other factor and outcome, they are subject to relatively lower sensitivity (S<0.3), which means that they wouldn't cause significant errors in the SROI calculation.

<u>Worst-case and Best- case scenario of the social value:</u>
As the SROI calculation is subject to errors, we will present the SROI in terms of a range by estimating the worst- and best- case scenarios. The details of calculation is shown in the Appendix 3 Impact Map. According to the above sensitivity analysis, the monetized social value of the program is ranged from:

HK$ 393,752 – 1,745,037

With a financial return of HK$ 316,000, the financial and social return of the program ranged from:

HK$ 707,752 – 2,059,037

The Social Return on Investment (SROI) is ranged from:

1.1 – 3.2

The social value score is ranged from:

11.8 – 44.1

Section 3 Verifying Outcomes

To verify the outcomes and the rationale in the report, we maintained ongoing communication with stakeholders in different stages of the assessment. We followed the below processes to verify the outcomes.

Consultation session one:
A stakeholder consultation session was conducted after we drafted the initial theory of change. We involved the founder of the program and experts in the university to give feedback.

Consultation session two:
Another consultation session was conducted after we interviewed the stakeholders to fine-tune the outcomes and questions in the quantitative survey.

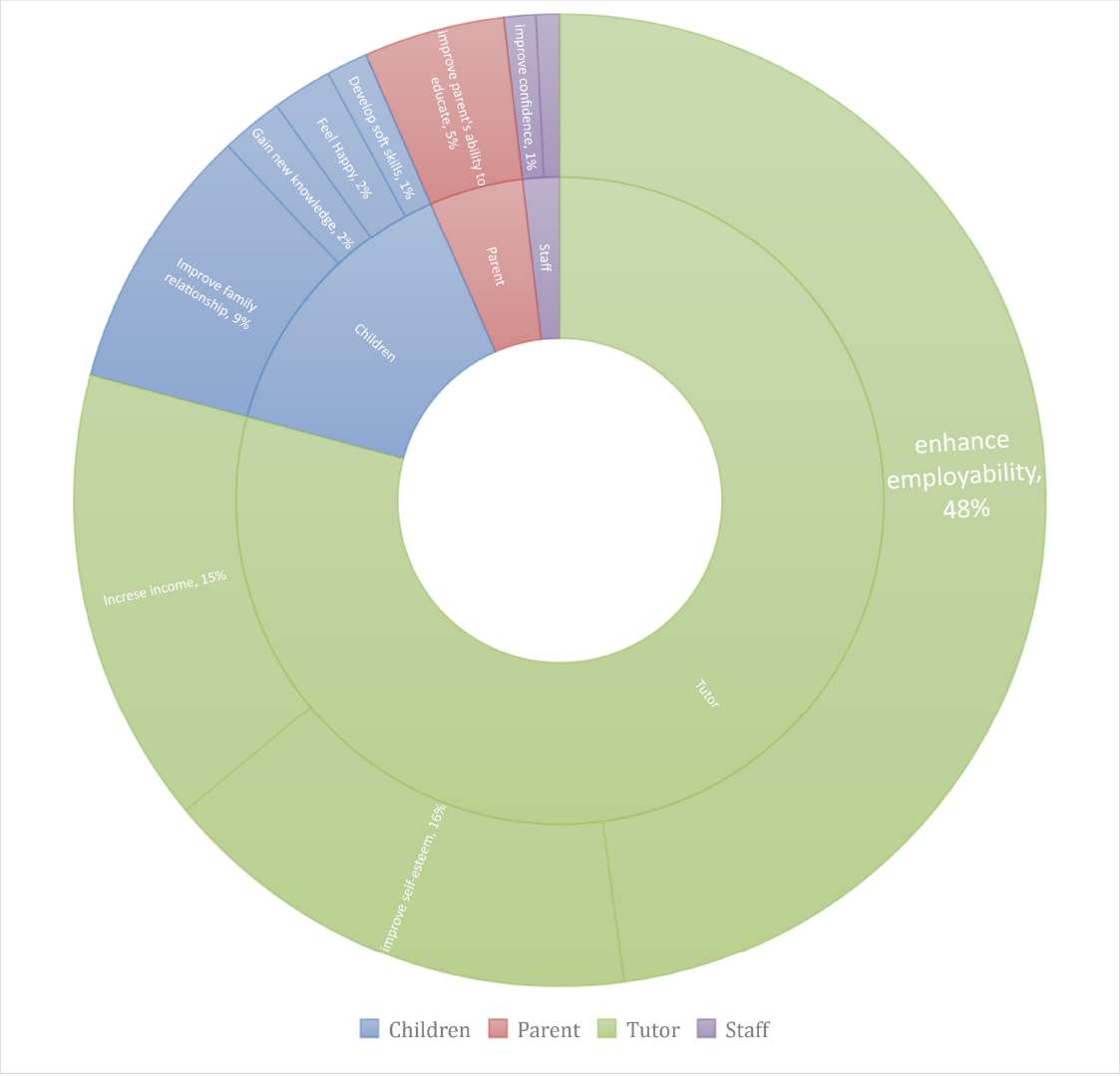
Presentation:
A final presentation was made to the stakeholders when we concluded the primary result. In the presentation, we went through the assessment methodology, limitations, theory of change, results of qualitative and quantitative surveys, financial proxies and initial impact calculation and recommendations.

Written report:
The written report was circulated to stakeholders for their reference and comments and submitted to Social Value International for report assurance by independent and qualified social impact assessment professionals.

Chapter 5 Conclusion and

recommendations

Through the assessment process, we concluded that the social return on investment (SROI) of the project is 1.9, ranging from 1.1 to 3.2. In other words, Idea Maker HK invested HK$645,000 in the program and generated around HK$1,239,835 in social and financial return, ranging from HK$ 707,752 to HK$ 2,059,037.



Impact Distribution:

79% of the impact was generated for the youth tutors. The ranking between each impact is “Improved employability (48%)“, “Boost self-esteem and self-confidence (16%)”, and “Increase Income (15%)”. We think what makes “Improved employability” stand out from other outcomes is because there was seldom a chance for

underprivileged youth who did not receive teacher training to deliver a lecture in schools. Such experience not only did it enhance the working experience of the tutors, but also improved its network with the schools. Some schools were reported to hire the tutors afterward.

14% of the impact was generated for the children. The ranking between each impact is "Improve family relationship (9%)", "Gain new knowledge (2%)", "Develop soft skills (2%)" and "Feel happy (1%)". As the program allowed parents to attend the classes together with their children, we found out that children indeed treasured the moment with their parents very much.

5% of the impact was generated for the parents in the area of "Improve parent's ability to educate their children (5%)". The parents pointed out that the program can also update their knowledge so that they can better educate their children. Without the program, the parent did not think we would learn such knowledge by themselves.

Finally, 2% of the impact was generated to staff, 1% for "being confident in organising similar programs afterward" and 1 % for "increase empathy".

Recommendations:

Two recommendations were made for the Idea Maker HK:

1) The program could generate lots of impact on improving the employability of the youth tutors. They treasured such experiences rather than earning a higher income and improving their self-esteem or self-confidence. One of the key elements is that the tutors can work in schools as training. This element shall be kept or even enhanced in order to generate more impact.

2) Although the program did not aim to position it as a family activity, this element did make the program different compared to other educational programs. Idea Maker may further explore developing elements or programs in this area.

Appendix 1 References

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14. Standard on Applying Principle 5: Do Not Overclaim
15. Standard on Applying Principle 6: Be Transparent
16. Standard on Applying Principle 7: Verify The Result
17. Standard on Applying Principle 8: Be Responsive

Appendix 2 Interview Outline and Questionnaire

The questionniares were written in Chinese and translated by Google Translate for report assurance purposes.

Qualitative survey:
Children:

1. What is your age?
2. What is your grade?
3. Where do you live? Public housing or private housing?
4. When did you join the program of Idea Maker HK?
5. How long have you been to the program of Idea Maker HK?
6. Besides your time, did you have any other input (e.g. money, equipment) to this program in order to make this happen?
7. Do you remember your experience of the classes? Could you tell us what did you experience?

8. What changes, both happy/ unhappy, expected/unexpected, do you think the program of Idea Maker HK brought to you? (interviewer may propose some outcomes to facilitate interviewee's thinking if they don't have any clues)
9. What happened next? (Until a probable well-defined outcome occurred.)
10. Any other outcomes happened?
11. Can you rank the importance of the outcomes that you mentioned on a scale of 0 - 10?
12. Can you compare the importance of the outcomes with your other life experience? (e.g. going to a amusement park.)
13. Do you think there was other factor contributing to the changes?
14. Do you think you'll completely forget what you've learned after a year ?
15. Do you observe any other stakeholders experienced changes significantly due to the program? Who are they and what are the changes?

Parents:

1. When did you join the Idea Maker Program?
2. Have you attended Idea Maker HK's class with your children? (Co-class means participating in most of the class activities together. If you are only in the same space or only participate in a small part of the class, it does not count as a class together.)
3. How long have you been to the program of Idea Maker HK?
4. Besides your time, did you have any other input (e.g. money, equipment) to this program in order to make this happen?
5. Could you tell me you experience of the program?
6. What changes, both intentional and unintentional, positive and negative, do you observe the Idea Maker program brought to your children? Can you provide examples? (interviewer may propose some outcomes to facilitate interviewee's thinking if they don't have any clues)
7. What happened to your children next? (Until a probable well-defined outcome occurred.)
8. Any other outcomes happened on your children?
9. Do you observe there was other factor contributing to the changes of your children?
10. Do you observe your children had completely forget what they learned after a year ?
11. What changes do you think the Idea Maker program brought to you?
12. What happened next?
13. Any other outcomes happened?
14. Do you think there was other factor contributing to the changes?
15. WIthout the program, do you think the changes will happen?
16. Can you rank the importance of the outcomes that you mentioned on a scale of 0 - 10?
17. Can you compare the importance of the outcomes with your other life experience? (e.g. having a training course.)
18. Do you observe any other stakeholders experienced changes significantly due to the program? Who are they and what are the changes?
19. How many people live with you in your household (excluding domestic

helpers)?
20. What is your average monthly household income?

Tutors:

1. What is your education level?
2. How many people live with you in your household (excluding domestic helpers)?
3. What is the average monthly household income?
4. Have you filled out the last Idea Maker Teaching Assistants' STEM Class Opinion Survey ?
5. When did you become a tutor of the Idea Maker Program?
6. Are you currently working as a tutor at Idea Maker? How long have you been the program's tutor?
7. How long have you received on-the-job training from Idea Maker?
8. Besides your time, did you have any other input (e.g. money, equipment) to this program in order to make this happen?
9. How much salary did you earn through the program?
10. Could you tell me you experience of the program?
11. What changes, both intentional and unintentional, positive and negative, do you observe the Idea Maker program brought to you? Can you provide examples? (interviewer may propose some outcomes to facilitate interviewee's thinking if they don't have any clues)
12. What happened next? (Until a probable well-defined outcome occurred.)
13. Any other outcomes happened?
14. Do you think there was other factor contributing to the changes?
15. WIthout the program, do you think the changes will happen?
16. Can you rank the importance of the outcomes that you mentioned on a scale of 0 - 10?
17. Can you compare the importance of the outcomes with your other life experience? (e.g. the income that you earned through the program.)
18. Do you observe any other stakeholders experienced changes significantly due to the program? Who are they and what are the changes?
19. Do you observe any changes on your students after taking the program? Can you provide examples?
20. What happened next? (Until a probable well-defined outcome occurred.)

Founder (Staff):

1. Can you introduce briefly the Idea Maker Program?
2. What are the main activities in the program?
3. Who are the key stakeholder in this program?
4. How much did you invest to the program?
5. What are the key output of the program?
6. Could you tell me you experience of the program?
7. What changes, both intentional and unintentional, positive and negative, do you observe the Idea Maker program brought to you? Can you provide

examples? (interviewer may propose some outcomes to facilitate interviewee's thinking if they don't have any clues)

8. What happened next? (Until a probable well-defined outcome occurred.)
9. Any other outcomes happened?
10. Do you think there was other factor contributing to the changes?
11. WIthout the program, do you think the changes will happen?
12. Can you rank the importance of the outcomes that you mentioned on a scale of 0 - 10?
13. Can you compare the importance of the outcomes with your other life experience? (e.g. having a training course.)
14. Do you observe any other stakeholders experienced changes significantly due to the program? Who are they and what are the changes?

Staff:

15. How long have you been to the program of Idea Maker HK?
16. Besides your time, did you have any other input (e.g. money, equipment) to this program in order to make this happen?
17. Could you tell me you experience of the program?
18. What changes, both intentional and unintentional, positive and negative, do you observe the Idea Maker program brought to you? Can you provide examples? (interviewer may propose some outcomes to facilitate interviewee's thinking if they don't have any clues)
19. What happened next? (Until a probable well-defined outcome occurred.)
20. Any other outcomes happened?
21. Do you think there was other factor contributing to the changes?
22. WIthout the program, do you think the changes will happen?
23. Can you rank the importance of the outcomes that you mentioned on a scale of 0 - 10?
24. Can you compare the importance of the outcomes with your other life experience? (e.g. having a training course.)
25. Do you observe any other stakeholders experienced changes significantly due to the program? Who are they and what are the changes?

Quantitative survey:

<u>Children:</u>

Seeking consent of answering the questionnaire
Q1: Do you want to answer this questionnaire? 1. yes 2. no

Q2: Did your parents attend the Idea Maker HK class with you ? (Co- class means that parents participate in most of the class activities together . If the parents are only in the same room or only participate in a small part of the class , it does not count as a class together .) 1. Yes 2. No	
1. Outcome: Become happier	
Confirming the outcome: Interesting class → Having fun and feel happier	Q3 When taking Idea Maker HK's class, do you feel unhappy? 1. very happy 2. happy 3. generally 4. unhappy 5. do not know
Deadweight	Q4 Are you a person who is always happy? 1. often 2. Yes 3. sometimes 4. no 5. do not know
Attribution	N/A
Displacement	N/A
drop-off	N/A
2. Outcome: Teenagers can gain more STEM knowledge	
Confirming the outcome: Joining Idea Maker program→ Gain new STEM knowledge	Q5. To what extent do you think the course has improved your knowledge ? 3D-printing and other technical knowledge 1. learn a lot 2. more 3. generally 4. a little 5. No Other common sense and fine arts 6. learn a lot 7. more 8. generally 9. a little 10. No

Deadweight	Q6 Even without this course , will you find other channels to learn STEM during this time ? 1. Great chance 2. greater chance 3. Half and half 4. lesser chance 5. Won't
Attribution	N/A
Displacement	N/A
drop-off	Q7 Do you think you'll completely forget what you've learned after a year ? 1. Great chance 2. greater chance 3. Half and half 4. lesser chance 5. Won't
3. Outcome: Develop soft skills	
Confirming the outcome: Joining Idea Maker program→ Develop soft skills	Q8 To what extent do you think the course has improved your knowledge ? Creativity (eg : having new ideas) 11. learn a lot 12. more 13. generally 14. a little 15. No speaking ability 16. learn a lot 17. more 18. generally 19. a little 20. No Thinking ability 21. learn a lot 22. more 23. generally 24. a little 25. No Ability to concentrate 26. learn a lot

	27. more 28. generally 29. a little 30. No
Attribution	N/A
Deadweight	Q9 Even without this course , will you find other channels to learn STEM during this time ? 6. Great chance 7. greater chance 8. Half and half 9. lesser chance Won't
Displacement	N/A
drop-off	Q10 If the program does not continue , do you think the soft skills you have learned will wear off after a year ? 1. Great chance 2. greater chance 3. half and half 4. lesser chance 5. Won't
4. Outcome: Improve family relationship	
Confirming the outcome: Willing share STEM learning experience to parents → Improve family relations hip	Q11 To what extent has this class enhanced your relationship with your parents ? (For example, you can actively share the course experiment with your parents or enhance your relationship by taking classes together) 1. Significantly improved 2. more lift 3. improve to some extent 4. slightly improved 5. no boost
Attribution	N/A
Deadweight	Q12 Do you think your relationship with your family will grow stronger as you grow up ? 1. Great chance 2. greater chance 3. Half and half

	4. lesser chance 5. Won't
Displacement	N/A
drop-off	N/A
Other Questions	
Express the relative importance (value) of the outcome	Q13 : Please describe the importance of the following benefits to you : (0 points: extremely unimportant ; 10 points: extremely important) 1. make yourself happy 2. Increase knowledge of STEM 3. Improve your soft skills (formative skills, creativity) 4. Improve relationship with family
Exploring other outcomes	Q14 : In addition to the above, has this program brought you other important benefits (whether good or bad) ? (Please rate the importance of this benefit from 0 to 10) _____
Basic Information (For segmentation purpose)	Q15 your grade _____ Q16 the type of residence you live 1. public housing 2. subsidized housing 3. private building 4. other _ _ _ _ _ _ _

Parents:

Cross confirming children' s outcomes	
Parent's participation	Have you attended Idea Maker HK's class with your children? (Co-class means participating in most of the class activities together. If you are only in the same space or only participate in a small part of the class, it does not count as a class together.) 1. Yes 2. No
Children's happiness	Q1: According to your observation, are your children happy in Idea Maker HK's class? 1. very happy 2. happy 3. generally 4. unhappy 5. very unhappy 6. do not know

Deadweight	Q2: Are your children a person who is always happy? 1. strongly agree 2. Agree 3. Half and half 4. disagree 5. strongly disagree
Children's knowledge	Q3: Based on your observations, to what extent do you think your children's knowledge of STEM has improved after taking the course ? Knowledge of STEM 1. Significant improvement 2. more lift 3. Some improvement 4. slightly improved 5. no significant improvement Other knowledge (such as art, culture, environmental protection, etc.) 1. Significant improvement 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement creative thinking 1. Significant improvement 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement Problem solving ability 1. Significant improvement 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement communication skills 1. Significant improvement 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement concentration 1. Significantly improved 2. more boost 3. to a certain extent 4. slightly improved 5. no significant improvement
Deadweight	Q4 : Even if there is no such course, during this time, will you arrange for your children to learn STEM from other channels to achieve similar learning effects ? (For example, have brothers and sisters, neighbors, school teachers or can teach their children by yourself related knowledge)

	1. Great chance 2. Greater chance 3. Half and half 4. lesser chance 5. Won't
Improve family relationship	Q5: Will your relationship with your children be improved by this course ? (For example: Children take the initiative to share course experiments, class together, etc.) 1. Significant improvement 2. More lift 3. A certain degree of increase 4. Slightly improved 5. no significant improvement
Improve understanding of the kids	Q6: To what extent has this class enhanced your understanding of your children? Knowledge of children's interests 1. Significant improvement 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement understanding of children's personalities 1. Significant improvement 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement understanding of children's abilities 1. Significant improvement 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement
Outcome: help parents to educate their children	
Measuring how much is the outcome	Q7: what extent do you think the courses or tutors of Idea Maker HK can educate your children for you? 1. Significant assistance 2. More assistance 3. Some level of assistance 4. a little help 5. no assistance
Attribution	Not applicable

Deadweight	Q8: Even if there is no such course, during this period, will you arrange for your children to learn STEM from other channels to achieve similar learning effects ? (For example, have brothers and sisters, neighbors, school teachers or can teach their children about STEM by themselves? knowledge) 1. Great chance 2. Greater chance 3. Half and half 4. lesser chance 5. Won't
Displacement	Not applicable
drop-off	Not applicable
Outcome: Increase knowledge	
Measuring how much is the outcome	Q9: To what extent do you think your study skills have improved if you have attended classes together? Knowledge of STEM 1. Significant improvement 2. more lift 3. Some improvement 4. slightly improved 5. no significant improvement Other knowledge (such as art, culture, environmental protection, etc.) 1. Significantly improved 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement creative thinking 1. Significantly improved 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement Problem solving ability 1. Significantly improved 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement communication skills 1. Significantly improved 2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement concentration 1. Significantly improved

	2. more boost 3. Some improvement 4. slightly improved 5. no significant improvement
Attribution	N/A
Deadweight	Q10: Even if there is no such course, during this period, will you arrange for your children to learn STEM from other channels to achieve similar learning effects ? (For example, have brothers and sisters, neighbors, school teachers or can teach their children about STEM by themselves? knowledge) 1. Great chance 2. greater chance 3. Half and half 4. Lesser chance 5. no
Displacement	N/A
drop-off	N/A
Others Questions	
Express the relative importance (value) of the outcome	Q11: Please describe the importance of the following benefits to you: (0 points : extremely unimportant; 10 points : extremely important) 1. To help you better teach your children 2. Improve parent-child relationship 3. Save money 4. Learn more by yourself
Exploring other outcomes	Q12: Apart from the above, has this course brought you other important benefits ? (whether good or bad) (please rate the importance of this benefit 0-10) _____
Basic Information (For segmentation purpose)	Q13: The grade your child is in _____ Q14: The type of your residence 1. Public housing 2. subsidized housing 3. Private buildings 4. other Q 15 : How many people live with you in your household (excluding domestic helpers)? Q 16 : What is the average monthly household income?

<u>Tutors:</u>

Basic Information (For segmentation purpose)	Q1: What is your education level? 1. Elementary school or below 2. junior high school 3. high school 4. College or above Q2: How many people live with you in your household (excluding domestic helpers)? Q3: What is the average monthly household income? Q4: Are you currently working as a teaching assistant at Idea Maker? Q5: How long have you received on-the-job training from Idea Maker? 1- 10 hours 21- 30 hours Q6 : Have you filled out the last Idea Maker Teaching Assistants' STEM Class Opinion Survey ? Yes no
Outcome 1 : Increase income	
Measuring how much is the outcome	Q7: Are you satisfied with the current Idea Maker income? 1. Very satisfied 2. satisfy 3. Half and half 4. dissatisfied 5. Very dissatisfied Q8: What is the difference between your current monthly average income (including other income) and your income before participating in Idea Maker HK ?
Attribution	N/A
Deadweight	Q8 : If this program is not held, during this period, will you find other ways to increase your ability to earn a similar income ? (For example: attend other training courses , job-hunting training, etc.) 1. Great chance 2. big opportunity 3. Half and half 4. small chance 5. No
Displacement	Not applicable
drop-off	Not applicable
Outcome 2 : Boost self-esteem and confidence	

Measuring how much is the outcome	Q9: After participating in this program, will your self-confidence be improved ? 1. Significantly improved 2. more lift 3. less boost 4. no significant improvement Q10: Please select the one that best reflects your participation in the Idea Maker program. (Using the rosenberg self-esteem scale)
Attribution	N/A
Deadweight	Q11 : If this program is not held, during this time, will you find other ways to improve self- focus and self-confidence ? 1. Great chance 2. big opportunity 3. Half and half 4. small chance 5. Won't
Displacement	Not applicable
drop-off	Not applicable
Outcome 1 : Increase career opportunity (An aspect of Improve Employability)	
Measuring how much is the outcome	Q12: To what extent do you think participating in this program has improved your chances of entering the education industry? 1. Significantly improved 2. more lift 3. less boost 4. no significant improvement Q13: To what extent do you think participating in this program improves your chances of finding a job? 1. Significantly improved 2. more lift 3. less boost 4. no significant improvement
Attribution	N/A
Deadweight	Q14: If this program is not held, during this time, do you use other methods to join the education industry? 1. Great chance 2. big opportunity 3. Half and half 4. small chance 5. Won't
Displacement	N/A

drop-off	Not applicable
Outcome 1 : Increase working ability (An aspect of Improve Employability)	
Measuring how much is the outcome	Q15: After participating in this program, what benefits did you have? - STEM knowledge and skills - Teaching Experience - Communication skills - Presentation Skills - Classroom Control Skills - Increase teamwork - Improve the ability to reflect and improve - Learn to design curriculum - Learn and make good use of design thinking 1. Very much agree 2. agree 3. generally 4. disagree 5. strongly disagree
Attribution	N/A
Deadweight	Q16: If this program is not held, during this time, do you use other methods to increase working ability? 6. Great chance 7. big opportunity 8. Half and half 9. small chance 10. Won't
Displacement	Not applicable
drop-off	Q 17 : If this program does not continue, do you think you will forget the job skills you have learned after one year ? 1. Great chance 2. Greater chance 3. Half and half 4. Small chance 5. No
Cross-confirming Outcome: Children can gain more knowledge and soft skills	
Confirming the outcome: (STEM Knowledge)	Q18: To what extent do you think your students have improved their STEM knowledge 1. Significantly improved 2. more lift 3. Half and half 4. less boost 5. no significant improvement

Confirming the outcome: (soft skills)	Q19: After taking the course, how much do you think your students' soft skills have improved ? (For example: presentation skills, creativity, etc.) 1. Significantly improved 2. more lift 3. Half and half 4. less boost 5. no significant improvement
Others Questions	
Express the relative importance (value) of the outcome	Q20: Please describe the importance of the following benefits to you: (0 points: extremely unimportant; 10 points: extremely important) 1. increase income 2. boost self-confidence 3. Improve job skills 4. increase employment opportunities
Exploring other outcomes	Q21 : In addition to the above, has this program brought you other important benefits (whether good or bad)? (Please rate the importance of this benefit on a 0-10 point) _____

Staff:

Outcome: Increase Empathy	
Measuring how much is the outcome	Q1: Has your empathy for disadvantaged groups increased or decreased after running this program? 1. significantly increased 2. small increase 3. No change 4. a small reduction 5. significantly reduced
Attribution	N/A
Deadweight	Q2: Without this program , would you help disadvantaged groups in other ways? 1. Great chance 2. big opportunity 3. Half and half 4. small chance 5. Won't
Displacement	N/A
drop-off	Q3: If the program does not continue, do you think your empathy will decrease after a year? 1. Great chance 2. big opportunity

	3. Half and half 4. small chance 5. Won't
Outcome: Being confident in organising similar program afterward	
Measuring how much is the outcome	Q4: After holding this program, have your confidence in holding similar events increased or decreased? 1. Significantly increased 2. small increase 3. No change 4. a small reduction 5. significantly reduced
Attribution	N/A
Deadweight	Q5: If this program is not held, during this period, will you find other ways to improve your ability to hold similar activities? (For example: participating in training classes or holding other programs have similar effects) 1. Great chance 2. big opportunity 3. Half and half 4. small chance 5. Won't
Displacement	N/A
drop-off	Q6: If this program does not continue, do you think your ability to hold similar events will be rusty after a year? 1. Great chance 2. big opportunity 3. Half and half 4. small chance 5. Won't
Outcome: Reduce quality of life	
Measuring how much is the outcome	Q7: To what extent did this program reduce your quality of life? (For example, due to increased stress and insufficient rest time) 1. no drop 2. a small drop 3. There is a significant decrease
Attribution	Not applicable
Deadweight	Q8: If this program is not held, during this time, will you face the same pressure and situation due to other programs? 1. Great chance 2. big opportunity 3. half half 4. small chance

	5. Won't
Displacement	Not applicable
drop-off	Q9: If this plan does not continue, will you restore your previous quality of life? (For example, due to reduced stress, increased rest time, etc.) 1. Great chance 2. big opportunity 3. half half 4. small chance 5. no
Others Questions	
Express the relative importance (value) of the outcome	Q10: Please describe the importance of the following benefits to you: (0 points : extremely unimportant; 10 points : extremely important) 1. Increase empathy for disadvantaged groups 2. Increase confidence in hosting similar programs 3. Reduced quality of life
Exploring other outcomes	Q11: In addition to the above, has this program brought you other important benefits (whether good or bad) ? (Please rate the importance of this benefit on a 0-10 point) _____

Appendix 3 Impact Map

Refer to "Idea Maker Value-Map-v7.5.xls"

Scope

Organisation	Idea Maker HK				Name	Tom Chan
Objectives	This report is to evaluate the social impact of the self-financing part of the Idea Maker Program generated by the Idea Maker HK from 1 Jan 2021 to 31 Dec 2021 for their management's understanding of the impact of the program				Date	Oct-22
Scope	Activity	Idea Maker Program. (a program that train underprivileged youth to become STEM tutors to provide STEM interest classes to children)	Goals - how the activity leads to the desired impact	1. The program recruits and trains disadvantaged youth to become STEM tutors. The recruit youth will receive 20-hour basic STEM courses, on-the-job training and coaching. Trained youngsters will assist in STEM classes for children. We aim to evaluate the social impact created by the training. 2. In the program, the children will learn about STEM through 10 STEM lessons. Some of the children parent will join the classes with their children. We aim to evaluate the social impacted generated through the classes.	Time Period of activity	From 1 Jan 2021 to 31 Dec 2021
					Time Period of analysis	3 years after the program
	Contract / Funding / Part of org	The self-financing part of the program	What decisions will be influenced by this analysis?	The management's understanding of the impact of the program	Forecast or Evaluation	Evaluation

Base Case Scenario:

SROI Value Map

This sheet is designed to help you develop your SROI analysis. If your analysis does not use monetary valuation of outcomes, please use the "Value Map (non-SROI)" tab. For further information please see the "Guidance" tab.

Stage 1 | Stage 2 | Stage 4

Who and how many?		At what cost?		Outputs	What changes?	How much?			How long?		How valuable?			How much caused by the activity?				Still material?
Stakeholders		Inputs			Outcomes						Express the relative importance (value) of the outcome			Deadweight %	Displacement %	Attribution %	Drop off %	Impact calculation
					Outcome description	Indicator and source	Quantity (scale)	Amount of change per stakeholder (depth)	Duration of outcomes	Outcomes start	Weighting	Valuation approach (monetary)	Monetary valuation					
Who do we have an effect on? / Who has an effect on us?	How many in group?	What will/did they invest and how much (money, time)?	Financial value (for the total population for the accounting period)	Summary of activity in numbers.	What is the change experienced by stakeholders?	Describe how you will measure the described outcome (including any sources used)	Number of people experiencing described outcome.	Describe the average amount of change experienced (or to be experienced) per stakeholder.	How long (in years) does the outcome last for?	Does the outcome start in Period of activity or in the Period after?	How important is this outcome to stakeholders? (e.g. on a scale of 0-10) (N.B. To make comparison between outcomes possible, your analysis should be consistant in the type of weighting used).	Describe the monetary valuation approach used to express the relative importance (value) of each outcome. (N.B. If your analysis does not use monetary valuation of outcomes, please use the Value Map (non-SROI) tab of this spreadsheet).	How important is the outcome to stakeholders (expressed in monetary terms)?	What will happen/what would have happened without the activity?	What activity would/did you displace?	Who else contributed to the change?	Does the outcome drop off in future years?	Number of people (quantity) times value, less deadweight, displacement and attribution
Children	158	The assessment aims to evaluate the impact generated by the idea Maker HK. The impact contributed by other parties (e.g. parents and children) were taken out through the calculation of the attribution. Therefore, time cost is taken out correspondingly.	0	10 STEM classes	Feel Happy	5-point Likert scale on the happiness of the class reported by children and observed by parents	140	0.89	1	Period of activity	8.75	anchoring	1,216.00	88%	0%	10%	100%	18,579.39
Children	158		0	10 STEM classes	Gain new knowledge	Average of 5-point Likert scale on 2 dimensions of knowledge. (STEM knowledge, other knowledge) reported by children and observed by tutor and parents	131	0.83	4	Period of activity	9.5	revealed preference	660.00	93%	0%	10%	13%	5,842.29
Children	158		0	10 STEM classes	Develop soft skills	Average of 5-point Likert scale on 4 dimensions of knowledge (creative thinking, problem solving, communication skills and attention) reported by children, tutor and parents	130	0.82	4	Period of activity	9.5	revealed preference	660.00	93%	0%	10%	39%	5,793.01
Children	158		0	10 STEM classes	Improve family relationship	Average of 5-point scale reported by the parent and children	136	0.86	1	Period of activity	9.75	anchoring	1,305.00	50%	0%	10%	100%	83,141.85
Children's parents	158		0	10 STEM classes	Improve parent's ability to educate their children	5-point Likert scale on 2 dimensions (STEM knowledge, other knowledge, social return on investment)of knowledge reported by parents	115	0.73	1	Period of activity	8.4	revealed preference	500.00	15%	0%	10%	100%	43,906.03
Tutor	54	The time cost of the tutor has already been calculated by the salary given by Idea Maker HK. The value is taken to be zero to avoid double counting the input.	0	20 hours of training per tutor 10 STEM classes	Increase Income	Average increase of income compared with previous period reported by the tutor 5-point Likert scale on the satisfaction of the income reported by the tutor	30	0.55	1	Period of activity	7.47	cost-based approach	13,836.36	61%	0%	10%	100%	142,155.00
Tutor	54		0	20 hours of training per tutor 10 STEM classes	Boost self-esteem and self-confidence	Average of - 4-point scale on the increment of self-esteem and confidence reported by the tutor and - A simplified Rosenberg self-esteem scale	32	0.60	1	Period of activity	6.74	anchoring	12,303.70	58%	0%	10%	100%	150,686.62
Tutor	54		0	20 hours of training per tutor 10 STEM classes	Improved employability	The average score of increased career opportunity and working ability	35	0.66	4	Period of activity	7.53	anchoring	13,745.89	40%	0%	10%	57%	264,731.67
Idea Maker Staff	3	operating cost of the program	645,000.00	1 idea maker program	Increase empathy	5-point Likert scale on the change of empathy reported by staff	2	0.50	4	Period of activity	7.5	anchoring	4,688.00	38%	0%	10%	50%	3,955.50
Idea Maker Staff	3			1 idea maker program	Being confident in organising similar programs afterwards	5-point Likert scale on the change of confident reported by staff	2	0.75	4	Period of activity	8	revealed preference	5,000.00	38%	0%	10%	63%	6,328.13
		Total	645,000.00														**Total**	725,119.48

Calculating Social Return						
Discount rate		3.5%				
Year 0	Year 1	Year 2	Year 3	Year 4	Year 5	
18,579.39	0.00	0.00	0.00	0.00	0.00	
5,842.29	5,112.00	4,473.00	3,913.88	0.00	0.00	
5,793.01	3,562.70	2,191.06	1,347.50	0.00	0.00	
83,141.85	0.00	0.00	0.00	0.00	0.00	
43,906.03	0.00	0.00	0.00	0.00	0.00	
142,155.00	0.00	0.00	0.00	0.00	0.00	
150,686.62	0.00	0.00	0.00	0.00	0.00	
264,731.67	113,834.62	48,948.88	21,048.02	0.00	0.00	
3,955.50	1,977.75	988.88	494.44	0.00	0.00	
6,328.13	2,373.05	889.89	333.71	0.00	0.00	
725,119.48	126,860.12	57,491.72	27,137.55	0.00	0.00	
725,119.48	122,570.16	53,669.13	24,476.51	0.00	0.00	

Present value of each year	
Total Present Value (PV)	925,835.29
Net Present Value (PV minus the investment)	280,835.29
Financial Return	314,000.00
Social Return (Value per amount invested)	1.92

Worst Case Scenario:

SROI Value Map

This sheet is designed to help you develop your SROI analysis. If your analysis does not use monetary valuation of outcomes, please use the "Value Map (non-SROI)" tab. For further information please see the "Guidance" tab.

Stage 1	Stage 2										Stage 4					
ASSUMPTION							**- 15% due to statistical error**		**- 15% due to statistical error**	**Changed valuation approach as described in the report**	**downward adjustment as described in the report**	**+15% due to statistical error**		**upward adjustment as described in the report**	**+15% due to statistical error**	

Who and how many?		At what cost?		Outputs	What changes?	How much?			How long?		How valuable?			How much caused by the activity?				Still material?
Stakeholders		Inputs			Outcomes						Express the relative importance (value) of the outcome							
					Outcome description	Indicator and source	Quantity (scale)	Amount of change per stakeholder (depth)	Duration of outcomes	Outcomes start	Weighting	Valuation approach (monetary)	Monetary valuation	Deadweight %	Displacement %	Attribution %	Drop off %	Impact calculation
Who do we have an effect on? / Who has an effect on us?	How many in group?	What will/did they invest and how much (money, time)?	Financial value (for the total population for the accounting period)	Summary of activity in numbers.	What is the change experienced by stakeholders?	Describe how you will measure the described outcome (including any sources used)	Number of people experiencing described outcome.	Describe the average amount of change experienced (or to be experienced) per stakeholder.	How long (in years) does the outcome last for?	Does the outcome start in Period of activity or in the Period after?	How important is this outcome to stakeholders? (e.g. on a scale of 0-10) (N.B. To make comparison between outcomes possible, your analysis should be consistent in the type of weighting used).	Describe the monetary valuation approach used to express the relative importance (value) of each outcome. (N.B. If your analysis does not use monetary valuation of outcomes, please use the Value Map (non-SROI) tab of this spreadsheet).	How important is the outcome to stakeholders (expressed in monetary terms)?	What will happen/what would have happened without the activity?	What activity would/did you displace?	Who else contributed to the change?	Does the outcome drop off in future years?	Number of people (quantity) times value, less deadweight, displacement and attribution
Children	158	The assessment aims to evaluate the impact generated by the Idea Maker HK. The impact contributed by other parties (e.g. parents and children) were taken out through the calculation of the attribution. Therefore, time cost is taken out correspondingly.	0	10 STEM classes	Feel Happy	5-point Likert scale on the happiness of the class reported by children and observed by parents	106	0.77	1	Period of activity	7.6	anchoring	368.42	100%	0%	10%	100%	0.00
Children	158		0	10 STEM classes	Gain new knowledge	Average of 5-point Likert scale on 2 dimensions of knowledge (STEM knowledge, other knowledge) reported by children and observed by tutor and parents	114	0.72	4	Period of activity	8.3	revealed preference	400.00	100%	0%	30%	14%	0.00
Children	158		0	10 STEM classes	Develop soft skills	Average of 5-point Likert scale on 4 dimensions of knowledge (creative thinking, problem solving, communication skills and attention) reported by children, tutor and parents	113	0.72	4	Period of activity	8.3	revealed preference	400.00	100%	0%	30%	44%	0.00
Children	158		0	10 STEM classes	Improve family relationship	Average of 5-point scale reported by the parent and children	119	0.75	1	Period of activity	8.5	anchoring	410.53	58%	0%	50%	100%	10,343.56
Children's parents	158		0	10 STEM classes	Improve parent's ability to educate their children	5-point Likert scale on 2 dimensions (STEM knowledge, other knowledge, social return on investment)of knowledge reported by parents	100	0.63	1	Period of activity	7.3	revealed preference	500.00	17%	0%	10%	100%	37,168.53
Tutor	54	The time cost of the tutor has already been calculated by the salary given by Idea Maker HK. The value is taken to be zero to avoid double counting the input.	0	20 hours of training per tutor 10 STEM classes	Increase Income	Average increase of income compared with previous period reported by the tutor 5-point Likert scale on the satisfaction of the income reported by the tutor	26	0.48	1	Period of activity	6.5	cost-based approach	13,636.36	70%	0%	10%	100%	94,611.52
Tutor	54		0	20 hours of training per tutor 10 STEM classes	Boost self-esteem and self-confidence	Average of - 4-point scale on the increment of self-esteem and confidence reported by the tutor and - A simplified Rosebero self-esteem scale	28	0.52	1	Period of activity	5.9	revealed preference	10,000.00	67%	0%	30%	100%	65,673.39
Tutor	54		0	20 hours of training per tutor 10 STEM classes	Improved employability	The average score of increased career opportunity and working ability	31	0.57	4	Period of activity	6.5	revealed preference	10,000.00	45%	0%	30%	66%	117,497.60
Idea Maker Staff	3	operating cost of the program	645,000.00	1 idea maker program	Increase empathy	5-point Likert scale on the change of empathy reported by staff	1	0.43	4	Period of activity	6.5	anchoring	4,688.00	43%	0%	10%	58%	3,130.00
Idea Maker Staff	3			1 idea maker program	Being confident in organising similar programs afterwards	5-point Likert scale on the change of confident reported by staff	2	0.65	4	Period of activity	7.0	revealed preference	5,000.00	43%	0%	10%	72%	5,007.47

Calculating Social Return						
Discount rate		3.5%				
Year 0	Year 1	Year 2	Year 3	Year 4	Year 5
0.00	0.00	0.00	0.00	0.00	0.00
0.00	0.00	0.00	0.00	0.00	0.00
0.00	0.00	0.00	0.00	0.00	0.00
10,343.56	0.00	0.00	0.00	0.00	0.00
37,168.53	0.00	0.00	0.00	0.00	0.00
94,611.52	0.00	0.00	0.00	0.00	0.00
65,673.39	0.00	0.00	0.00	0.00	0.00
117,497.60	40,477.92	13,944.64	4,803.93	0.00	0.00
3,130.00	1,330.25	565.36	240.28	0.00	0.00
5,007.47	1,408.35	396.10	111.40	0.00	0.00

Total	645,000.00

Total	333,432.08

333,432.08	43,216.53	14,906.10	5,155.61	0.00	0.00
333,432.08	41,755.10	13,915.00	4,650.06	0.00	0.00

Present value of each year	
Total Present Value (PV)	393,752.25
Net Present Value (PV minus the investment)	-251,247.75
Financial Return	314,000.00
Social Return (Value per amount invested)	1.10

Best Case Scenario:

SROI Value Map

This sheet is designed to help you develop your SROI analysis. If your analysis does not use monetary valuation of outcomes, please use the "Value Map (non-SROI)" tab. For further information please see the "Guidance" tab.

Stage 1		Stage 2													Stage 4				
ASSUMPTION								+ 15% due to statistical error				+15% due to statistical error	Changed valuation approach as described in the report	downward adjustment as described in the report	-15% due to statistical error			-15% due to statistical error	
Who and how many?		At what cost?			What changes?	How much?			How long?			How valuable?			How much caused by the activity?				Still material?
Stakeholders		Inputs		Outputs	Outcomes	Indicator and source	Quantity (scale)	Amount of change per stakeholder	Duration of outcomes	Outcomes start		Express the relative importance (value) of the outcome			Deadweight %	Displacement %	Attribution %	Drop off %	Impact calculation
					Outcome description							Weighting	Valuation approach (monetary)	Monetary valuation					
Who do we have an effect on? Who has an effect on us?	How many in group?	What will/did they invest and how much (money, time)?	Financial value (for the total population for the accounting period)	Summary of activity in numbers.	What is the change experienced by stakeholders?	Describe how you will measure the described outcome (including any sources used)	Number of people experiencing described outcome.	Describe the average amount of change experienced (or to be experienced) per stakeholder.	How long (in years) does the outcome last for?	Does the outcome start in Period of activity or in the Period after?	Sum of duration and outcome start	How important is this outcome to stakeholders? (e.g. on a scale of 0-10) (N.B. To make comparison between outcomes possible, your analysis should be consistent in the type of weighting used).	Describe the monetary valuation approach used to express the relative importance (value) of each outcome. (N.B. If your analysis does not use monetary valuation of outcomes, please use the Value Map (non-SROI) tab of this spreadsheet).	How important is the outcome to stakeholders (expressed in monetary terms)?	What will happen/what would have happened without the activity?	What activity would/did you displace?	Who else contributed to the change?	Does the outcome drop off in future years?	Number of people (quantity) times value, less deadweight, displacement and attribution
Children	158	The assessment aims to evaluate the impact generated by the Idea Maker HK. The impact contributed by other parties (e.g. parents and children) were taken out through the calculation of the attribution. Therefore, time cost is taken out correspondingly.	0	10 STEM classes	Feel Happy	5-point Likert scale on the happiness of the class reported by children and observed by parents	137	1.00	1	Period of activity	anchoring	10.0	anchoring	1,000.00	76%	0%	10%	100%	29,138.90
Children	158		0	10 STEM classes	Gain new knowledge	Average of 5-point Likert scale on 2 dimensions of knowledge (STEM knowledge, other knowledge) reported by children and observed by tutor and parents	151	0.95	4	Period of activity	revealed preference	10.0	revealed preference	1,000.00	80%	0%	10%	11%	26,555.85
Children	158		0	10 STEM classes	Develop soft skills	Average of 5-point Likert scale on 4 dimensions of knowledge (creative thinking, problem solving, communication skills and attention) reported by children, tutor and parents	150	0.95	4	Period of activity	revealed preference	10.0	revealed preference	1,000.00	80%	0%	10%	33%	26,331.89
Children	158		0	10 STEM classes	Improve family relationship	Average of 5-point scale reported by the parent and children	157	0.99	1	Period of activity	anchoring	10.0	anchoring	1,000.00	43%	0%	10%	100%	79,767.09
Children's parents	158		0	10 STEM classes	Improve parent's ability to educate their children	5-point Likert scale on 2 dimensions (STEM knowledge, other knowledge, social return on investment)of knowledge reported by parents	132	0.84	1	Period of activity	revealed preference	9.7	revealed preference	500.00	13%	0%	10%	100%	51,654.15
Tutor	54	The time cost of the tutor has already been calculated by the salary given by Idea Maker HK. The value is taken to be zero to avoid double counting the input.	0	20 hours of training per tutor 10 STEM classes	Increase Income	Average increase of income compared with previous period reported by the tutor 5-point Likert scale on the satisfaction of the income reported by the tutor	34	0.63	1	Period of activity	cost-based approach	8.6	stated preference	13,636.36	53%	0%	10%	100%	196,830.00
Tutor	54		0	20 hours of training per tutor 10 STEM classes	Boost self-esteem and self-confidence	Average of - 4-point scale on the increment of self-esteem and confidence reported by the tutor and - A simplified Roseberg self-esteem scale	37	0.69	1	Period of activity	anchoring	7.8	revealed preference	20,000.00	50%	0%	10%	100%	332,424.00
Tutor	54		0	20 hours of training per tutor 10 STEM classes	Improved employability	The average score of increased career opportunity and working ability	41	0.75	4	Period of activity	anchoring	8.7	revealed preference	20,000.00	34%	0%	10%	50%	480,678.30
Idea Maker Staff	3	operating cost of the program	645,000.00	1 idea maker program	Increase empathy	5-point Likert scale on the change of empathy reported by staff	2	0.58	4	Period of activity	anchoring	8.6	anchoring	4,688.00	33%	0%	10%	43%	4,904.82
Idea Maker Staff	3			1 idea maker program	Being confident in organising similar programs afterwards	5-point Likert scale on the change of confident reported by staff	3	0.86	4	Period of activity	revealed preference	9.2	cost-based approach	5,000.00	33%	0%	10%	54%	7,846.88
		Total	645,000.00															Total	1,236,131.87

Calculating Social Return

Discount rate	3.5%				
Year 0	Year 1	Year 2	Year 3	Year 4	Year 5
29,138.90	0.00	0.00	0.00	0.00	0.00
26,555.85	23,669.34	21,096.59	18,803.48	0.00	0.00
26,331.89	17,516.43	11,652.23	7,751.27	0.00	0.00
79,767.09	0.00	0.00	0.00	0.00	0.00
51,654.15	0.00	0.00	0.00	0.00	0.00
196,830.00	0.00	0.00	0.00	0.00	0.00
332,424.00	0.00	0.00	0.00	0.00	0.00
480,678.30	242,429.06	122,268.57	61,665.89	0.00	0.00
4,904.82	2,772.29	1,566.95	885.67	0.00	0.00
7,846.88	3,582.27	1,635.38	746.59	0.00	0.00
1,236,131.87	289,969.39	158,219.72	89,852.89	0.00	0.00

	Year 0	Year 1	Year 2	Year 3	Year 4	Year 5
Present value of each year	1,236,131.87	280,163.66	147,699.80	81,042.16	0.00	0.00
Total Present Value (PV)						1,745,037.49
Net Present Value (PV minus the investment)						1,100,037.49
Financial Return						314,000.00
Social Return (Value per amount invested)						3.19