A Teacher's Guide

UNLEASH THE
I CAN MINDSET

DESIGN *for* CHANGE
KENYA
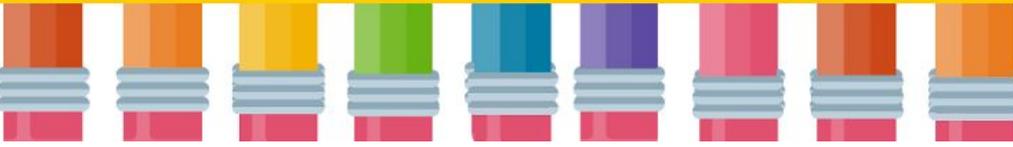
Design For Change Kenya is a program administered by

SCIENCE CENTRE KENYA

KALRO
Kenya Agricultural & Livestock
Research Organization

What's in this Toolkit?

The toolkit offers you ways to use the Design For Change process to guide students to develop solutions intentionally and collaboratively in their communities. The methods in this toolkit are adapted specifically for you and give you the flexibility to work within your schedule and workflow.

What is Design For Change?

DESIGN FOR CHANGE (DFC) is the largest global movement designed to give children an opportunity to express their own ideas for a better world and put them into action. It celebrates the fact that children are not helpless, that change is possible and that they can lead that change. The children are empowered by the process to design a more desirable and sustainable future - today!

DEAR TEACHERS

We at Design for Change Kenya recognise your important role in your students' lives. One particularly distinguished role is to guide students to see that changing lives can be meaningful and fun, and that through this process they can also 'be changed'. Design For Change helps you create opportunities for students to identify their real issues and concerns while giving them tools and empowerment to create meaningful change. This toolkit guides you as you embark on the journey of designing change along with them.

Design for Change is both a mindset and a creative act. It helps nurture key 21st century skills the skills necessary for the students to succeed in the future such as empathy, collaboration and persistence. Skills of communication, reflection, observation and problem solving are also honed.

Thank you for making Design for Change part of your curriculum.

From,
The DFC Kenya Team

Facilitators

Your role as a facilitator is essential to wake the world up to the potential of their children. You will be responsible for helping the children create meaningful solutions for the communities around them, be it at school, home or communities at large. This begins with a deep understanding of the community needs and you play a big role in sensitizing them to these needs.

iMPaCT: The DFC experience offers substantial learning gains for the children. DFC teaches them how to problem solve by tapping into their creativity, intuition, and imagination while being human-centered.

I CaN: The aim of DFC is to equip every child with the "I CAN" mindset to contribute to the interconnected society they live in.

ReSeaRCH: DFC has been conducting continuous studies to reaffirm the impact of its FIDS approach (FEEL · IMAGINE · DO · SHARE) on the holistic development of children. Research conducted by The GoodWork Project study of the Harvard Graduate School of Education has shown that the DFC curriculum provides students significant change to student development areas by increasing their empathic abilities, problem-solving, confidence and so much more.

DeSiGN THiNKiNG: DFC revolves around the methodology of design thinking, a human-centered design approach to solving problems. Your work with the children is essentially a partnership aimed at facilitating and supporting these young changemakers in the steps of DFC realization, that is, program design, development, implementation, evaluation and follow up.

Getting started

This toolkit offers a simple design thinking framework to find opportunities for change in their own communities and empower your children to lead change.

It would be great to have children do two change projects per year. Please do spend some time reading through the instructions and tips that follow. This toolkit is for your reference, please feel free to improvise and do what is best for your students. You can include Design for Change into your calendar by setting aside time.

Materials

The Design For Change process is both visual and experiential.

Before you being, find a space where you can build stuff and gather supplies like paper, cardboard boxes, foil, pens, tape, post-it notes, markers, adhesives, scissor, etc. Include digital tools like, cameras, computers, printer, etc., if possible.

Introducing Design For Change

Share about Design for Change and inspire your students with heroic stories from across the world. You can download stories at dfcworld.com

Choose any one story and prompt the students to think of ways that they might have offered a solution to that issue.

Teams

Make the students form teams (not more than 5 per team). This small size will make it easier for coordination and decision making.

Take pictures that capture the action.

Tips

Before you dig into the specifics, here are a few to keep in mind:

- ❏ Be willing to experiment.

- ❏ As the children learn, let yourself learn.

- ❏ The process may at times seem chaotic, abstract and ambiguous. Don't worry, don't rush. Have confidence in the process as it will eventually take shape.

- ❏ Step out of comfort zones and embrace fluidity by allowing routines to be broken while being strategic about what needs attention first.

- ❏ Use the world outside your classroom to invigorate the work.

- ❏ We would encourage you to help the children articulate their own ideas and to put them into action. Encourage ALL the children to participate actively and let their voices and ideas be heard. You will truly be surprised at what they come up with.

- ❏ Most importantly, have fun!

The Process

Design For Change is a four step process: FEEL, IMAGINE, DO and SHARE (FIDS) and this toolkit takes you through the process and methods.

Feel: This step starts with defining the problem by first **understanding** the situation before jumping to solve it. This stage allows for **empathy** to be developed, a necessity for project success. The essential aim is to move from assumptions to insights. This can only happen by engaging with the user being designed solutions for and thus the solutions are designed 'with', rather than 'for' them.

Imagine: This stage involves **brainstorming** solutions to improve, enrich and change the user experience. This is stage is important for developing **ethics.** Choosing to offer a solution to change the current situation requires taking responsibility for the same. This mindset helps to drive the belief that change is possible and that the children can drive it.

Do: This step is about creative agency and the ability to take timely action. This develops excellence. The 'action' that follows the 'intention' results in the desired 'impact'. Furthermore, the focus on the details allows the action to improve the 'quality' of the experience.

Share: This final step cultivates the **abundance** mentality and develops **elevation**. Elevation is the shift from 'competing' with others to 'completing' others. Inherent in this step is the belief that the 'I CAN' spirit offers hope and inspiration for further change.

Project Plan

You will need to integrate Design For Change into your school structure and this will entail the challenging task of fitting in time into your school's schedule during the days when you undertake the project.

In order to be able to fully enjoy the project, it is advisable to create a project plan that guides the project and that best suits you.

Choose the initial timeline you'd like to begin working with. A few suggestions would be doing a challenge in a day or immersing over the Design For Change process over one week to a month.

One day

This is an intense process that inspires new ideas but doesn't have the benefit of testing out of the ideas.

DAY

8am	FEEL
	IMAGINE
Noon	DO
	SHARE
5pm	

One week to one month

This is a continuous period of time that allows for a deep engagement with each step of the Design For Change process.

MONTH

SUN	MON	TUE	WED	THU	FRI	SAT
1	2	3	4 FEEL	5	6	7
8	9	10	11 IMAGINE	12	13	14
15	16	17	18 DO	19	20	21
22	23	24	25 SHARE	26	27	28
29	30	31				

Design For Change is a flexible process and you may find that your plan needs to adjust as you delve into the project. All you'll need to do is to match the flow of the project to the timeline of the school session.
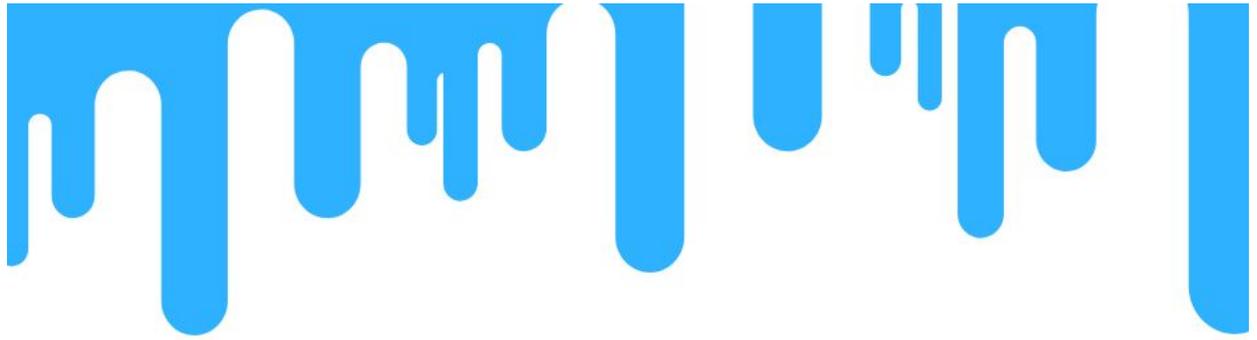
Icebreaker

The following activities are team bonding and building exercises that provide a warm up towards getting the students to work as a cohesive team!

Goal #1: To foster interaction by learning something new about their teammates and to spark conversation.

Get visual with a selfie: Ask your students to draw their self-portrait (selfie) and write their interests in a creative and relevant way. Then, let them walk around the room to quickly find a partner to share this information with. After the exercise, each person gets to introduce their partner. If there is an odd number of students in the group, you can participate to even things out.

Alphabetise Me: Tell the children to sort themselves in alphabetical order by their first name within four minutes. If it is a large gathering they can do this in groups. Then, in the same alphabetic order, each student should tell one important fact about themselves to the next one. The last student in the alphabetic sequence should pass on information about themselves to the first one in the line. At the end of the activity each student must introduce the one who passed on information to them and tell the class about the facts that they have learned.

## Goal #2: The idea here is that what seems like failure, can lead to success!

Twenty one questions: Choose an item in the room, hide it and students have to guess what it is. They can ask only questions that you can answer with either a `yes' or `no'. When someone finally gets it right, stress the fact that they would never have gotten it without everybody else's help; the "no" answers helped as much as the "yes" answers did.

Goal #3: Gets students thinking creatively, collaborating communicating and planning.

Balloon/Cup tower: In groups, use balloons and adhesive tape to build the tallest freestanding tower possible an allotted time. You can also build a tower of cups instead of balloons.

Ask the students the following questions after the activity:

- ❏ What worked for them? What didn't? How did they know?
- ❏ What was challenging? How did they deal with those challenges?
- ❏ How do they feel about the final result?
- ❏ How is this activity like working with a team?
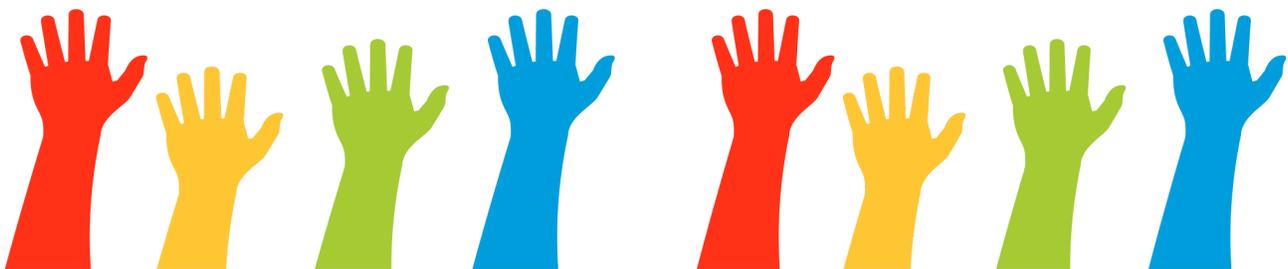
Introducing Design For Change

🕐	45 Minutes	Material: Paper, Pens, Pencils, Classroom board

Start by asking children who their favourite role model or champion is. Let a few children share who they like the most.

Tell them what Design for Change is about:

Design For Change is the largest global movement designed to give children an opportunity to express their own ideas for a better world and put them into action. Children who have discovered this are changing their world by changing something in their

- ❏ *lives,*
- ❏ *schools,*
- ❏ *Communities.*

After that tell them that you are going to show them stories of children who have already developed projects of change. You can find stories of change driven by children world-over based on your areas of interest, from innovation to art, environment to health, etc, at

<p align="center">https://www.dfcworld.com/kenya</p>

These stories will help you to explain the project and inspire your students.

Choose any one story and prompt the students to think of ways that they might have offered a solution to that issue.

Encourage brainstorming and record all the possible solutions on the board.

Repeat this process with different stories to help the students understand that they too can change the world!

FEEL

THE FIRST STEP TOWARDS MAKING CHANGE HAPPEN IS TO TRY TO UNDERSTAND HOW PEOPLE FEEL.

In this stage the students will identify opportunities for change in situations that affect their environment, be it at school, community or at a personal level. They will then dig deeper to identify the root cause.

As a facilitator:

❏ Locate and identify what bothers them. It does not have to 'sound' important. Let the process flow. If it is something that they feel strongly about, then it is truly important and it is therefore worthwhile to go deeper into it to understand it better.

❏ Help them notice all that is around them – the space, the people, all that happens.

❏ Ask questions to help students reach the root cause of the problem.

An opportunity for change

(clock icon)	30 min	Material: Paper, Pens, Pencils, Post-its

Ask the students to think deeply about situations or behaviours that bother them and that they would like to change or improve.

Let them draw out their ideas. Visualising ideas always helps to explain them better. The following graphic organiser can be used to help the students write or illustrate their thoughts on paper.

OPPORTUNITIES FOR CHANGE
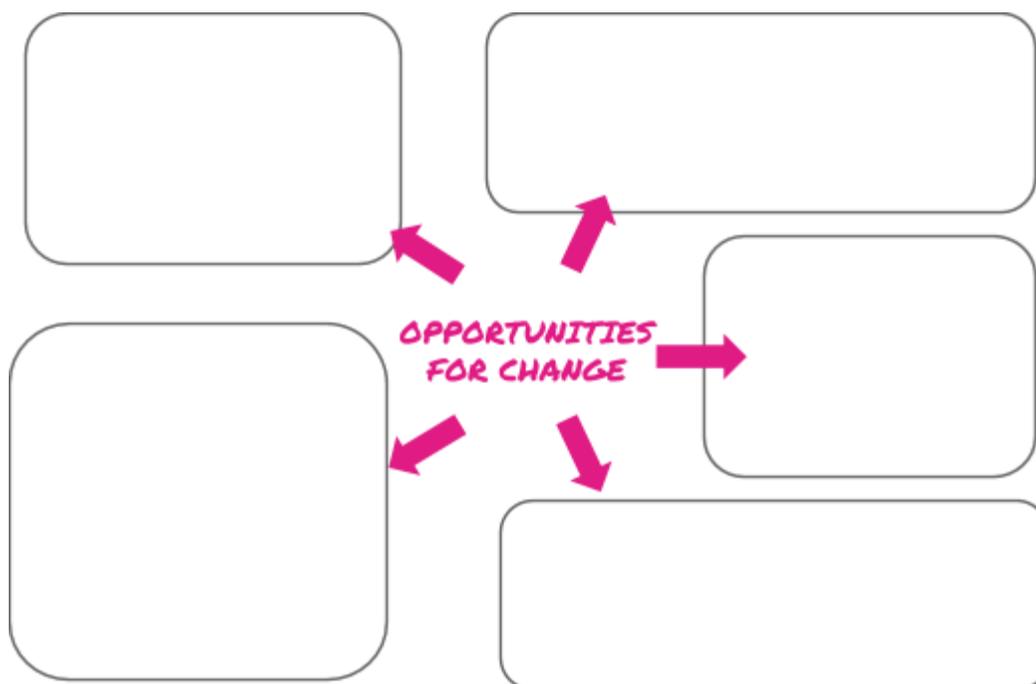
Even when they think you know the answer, ask them `WHY' repeatedly in response to five consecutive answers in order to get them to think deeply about that particular issue that bothers them.

Identifying the challenge

	30 min - 1 hour	Material: Paper, Pens, Pencils, Chalk, Markers, Post-its

Once the students have listed down the opportunities of change, now would be the time to get them to choose one topic that they would like to work on.

List all the problems that they have identified on the board or a vertical surface where everybody can read them.

If there are overlaps, ask them to identify the problems that are related and organise them into loose categories.

Go through each category and discuss what each one contains.

If possible, ask the students to describe the ideas in each category in one sentence.

Choosing the challenge

clock 30 min - 2 hours	Material: Pens, Markers, Chalk, Paper

Once you've identified the possible action points for the project, now would be the time to get them to choose a topic they are going to work on.

A system of voting will help to make a better choice. However, guide them to understand that choosing a topic through sharing of their opinions in order to convince others to join in would be a better way than voting. Use this opportunity to let them understand the importance of mutual respect and teamwork.

Make sure that they choose to work on something that is really important to them. You can ask follow-up questions like: *"How do you know that?"*, `*Why is that?"*, *"Why is it important?"*. Invite everyone to share knowledge about how the problem occurs.

The children can vote by show of hands, or marking on the action points that they choose on the board or via a secret ballot.

Understanding the challenge

	1 - 3 hours	Material: Notepad, Pens, Pencils, Camera

The moment has come for your students to dig deeper to understand better the situation they have chosen to improve and brainstorm solutions. At this stage they have take into account the various stakeholders in their chosen opportunity.

Ask questions:

❏ Who do the students believe is directly involved or affected by the challenge? This could include those they are directly problem-solving for, those who are loosely related to the topic, as well as the experts on the topic.

❏ Why do the students think the situation is the way it is?

❏ When does it happen?

Let the students share their multiple perspectives and use the board to note down all their observations.

One of the best ways to reach a deep understanding of the problem is by interviewing the people involved. Encourage the students to go and talk to them to understand their concerns.

❏ Start by asking general questions that will break the ice.

❏ Open ended questions encourage conversations, e.g., '*Can you help me understand more about..*', '*Can you tell me about an experience..*'

❏ Do not have too many people conducting the interview, designate roles instead.

❏ Each person in the team that is conducting the interview should keep their own notes on their observations. This is important since they will each have focused on different aspects.

INTERVIEW TIPS

❏ Make a list of questions that to be asked but remember to be flexible.

❏ Take lots of notes and capture direct quotes.

❏ Ask the participants/interviewees to show you the object or space they are talking about.

❏ If possible take photos of what you see. Remember to ask permission before taking any photos.

IMAGINE

VISUALISE CHANGE. THE CLEARER IT CAN BE IMAGINED, THE BETTER IT CAN BE DONE.

In this stage the students will brainstorm solutions for the problem that they are investigating.

As a facilitator:

❏ It is important to help the children identify the CORE problem that they are aiming to change.

❏ Once the real problem is identified, the solution will be much more deeper and long lasting.

❏ Encourage the students to think beyond the first or obvious solution and collect as many ideas from as many people as possible.

❏ Do not criticize. All ideas are good ideas and have potential at this stage.

❏ Active listening and openness to different ideas is encouraged.

❏ Build on the ideas of others – use the word `AND' instead of `BUT'.

❏ Note down all ideas.

❏ Generate as many ideas as possible.

❏ Stay focused on the subject.

BRAINSTORMING RULES

❏ Take turns talking. Listen when you're not talking. All ideas need to be heard, so that they may be built upon.

❏ Ask questions. Good ideas come from lots of questions.

❏ Visualize: Use paper to put down ideas in writing or even better sketch them.

Brainstorm

	30 min - 2 hours	Material: Paper, Pens, Pencils

Go through the brainstorming rules.

Divide children into groups and ask each group to come up with a number solutions to the problem.

Let each team member write their ideas down on paper, then they can share their ideas to the group.

Check on the groups as they brainstorm to see their progress.

Encourage a variety of ideas - even wild ones.

Go for volume - the best way to have a good idea is to have lots of ideas.

When it seems that the group has run out of ideas, challenge them to produce more by asking questions like, *"What can this achieve?"*, *"Are there any alternative solutions?"*, *"How do we obtain the necessary material?"*, *"How do we get more people to participate?.."* ,etc. The point is to cultivate independent thinking.

Once the students have come up with their ideas, walk them through the ideas once again.

Jot down all the points for future reference.

Close the session by asking the students to summarise what they did.

Choose an idea

	45 min - 2 hours	Material: Paper, Pens, Chalk, Markers, Classroom board

In this session, announce that the students will vote to choose the solutions they want to implement.

Refer to the paper from the brainstorming session where all the solutions are listed and point out that they have to vote for the ideas with the most promise for change

Encourage students to consider the following points while they choose the ideas that they like most:

❏ *Can we implement it?*

❏ *Would we be able to get resources for it?*

❏ *Will people find the solutions useful?*

❏ *What do fellow teammates feel about the chosen solution?*

An effective way to imagine impact would be to further categorise the solutions that the students come up with into the following Q ⬚ B ⬚ L ⬚ I categories:

Quick to implement ⬚ **B**old in nature ⬚ **L**ong lasting ⬚ **I**mpactful to many.

While voting, they can have a combination of more than one of these categorie as the most relevant solutions.

Define the idea

(clock icon)	30 min - 1 hour	Material: Paper, Pens, Chalk, Markers, Classroom board

After completing the voting process, let the students give a title to the opportunity for change. This will help define the concern.

A leading point would be to day, *"To make our story a powerful one, let us now come up with an interesting title for our story.."*

A good way to phrase the titles is to create generative questions, for example, those that start with: *"How might we….?"* or *"What if we…?"*

Divide them into small groups and encourage them to come up with a title.

Vote for the best title as a class.

End the session with the title and the list of solutions ready to be implemented.

DO

MAKE CHANGE HAPPEN.

BE THE CHANGE.

In this stage the students will come up with an action plan and implement it.

As a facilitator:

❏ Get as many of people involved to increase impact.

❏ Document the process of implementation in the form of a photo story or video to share.

❏ To keep the students motivated and excited, do remember to celebrate the small achievements with them.

Planning the action

(clock icon)	45 min - 3 hours	Material: Paper, Pens, Adhesive tape, Classroom board

Write down the title of the chosen problem on the board or stick it up on a paper where all can see.

Let the students know the following action points to consider before they start:.

- ❏ What resources will be required?

- ❏ How will the resources be acquired?

- ❏ How many people will be required?

- ❏ How much time will it take?

- ❏ How will the process be documented?

Divide the responsibilities by forming groups for each action point.

Each group should make a plan on a chart and put it up on the wall to see their progress.

Execute the plan

⏱	1 - 3 hours	Material: Paper, Pens, Camera

At the start of the session, go over the different action items that the students need to do then let them go for it!

It's possible that the actions may not turn out as imagined by your students. Don't allow them to get frustrated if this happens because the FIDS process (FEEL · IMAGINE · DO · SHARE) is not meant to be flawless. Rather, it gives permission to fail, to learn from mistakes and create new ideas. It is an iterative process that actually requires you to go back and forth through the steps.

During the implementation stage, tell the students not to forget to keep asking people for feedback that they can integrate back to their solution to improve it.

Remind your students to document their actions by writing them down, taking photos and through drawings. As they construct their story, they can focus on F ⬜ A ⬜ C ⬜ T ⬜ S :

- ❏ Feelings: *How can they depict the feelings of the people they are and their team-mates?*

- ❏ Actions: *Capture your teammates in action.*

- ❏ Changes: *How were people changed?*

- ❏ Transformations: *How was the community transformed?*

SHARE

SHARING OUR STORY OF CHANGE CAN INSPIRE OTHER CHILDREN TO SAY I CAN!

In this session the children will look at multiple ways to share their stories.

As a facilitator:

❏ To enrich the solution, do think of partnering with experts and professionals that are working in the area of concern to help them add different perspectives to the solution.

Reflection

🕐	1 - 2 hours	Material: Paper, Pens, Markers, Post-is

Begin by appreciating all the students for the efforts they have put into the process.

Put the students in groups and ask them to tell each other their stories based on their observations. Ask them write down quotes and observations and identify common themes.

The students can use the following questions as a guide to reflect on their learning experience:

- ❏ What 3 things did you learn about the situation?

- ❏ What 2 things did you learn about your teammates?

- ❏ What 1 thing did you learn about yourself?

Revisit the reason that the act of change was implemented for and review if the desired impact was achieved - for the people involved and affected by the problem. Was a better understanding of the cause / situation / behavior developed? This helps for further change movements.

Encourage the students to recall and share their happy moments and ask for volunteers who want to share the positive memories with the whole group.

Celebrate with the students their personal learnings and team evolution and encourage their continued participation.
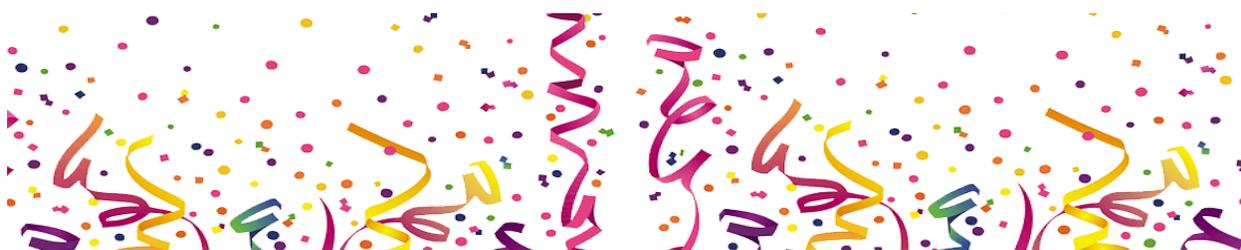
Share the story

⏱	1 - 2 hours	Material: Paper, Pens, Markers, Post-is

Put together the narrative of the journey of change in pictures or videos.

Here are some ideas to spread the magic of the story:

- ❏ School assembly, parents, friends

- ❏ Newspaper article

- ❏ TV Show

- ❏ Radio

- ❏ Social media

- ❏ Performance

Continue

To observe the human behaviour towards the solution and see if REAL impact has been achieved.

Look at ways in which you can stay with the project for at least a minimum of three months. This will help you see whether the solution has been able to bring long lasting change.

SHARE YOUR STORY WITH US!

Share your story with us at

challenge.dfcworld.com/KENYA

If you blur the boundaries between school and life,

then children go through a journey of

"aware," where they can see the change,

"enable," be changed,

and then

"empower," lead the change!

-   Kiran Bir Sethi

(Design For Change Founder)