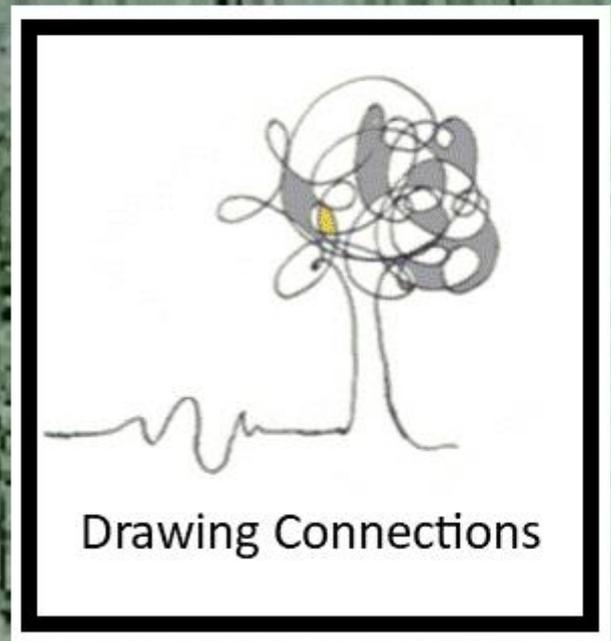


Diploma in Permaculture Design 7.



**DESIGN OF AN APPROACH TO
AID THE PLANNING,
PREPARATION AND RUNNING
OF A LEARNING SESSION**

Charlotte Synge

CONTENTS

CONTENTS	2
OVERVIEW OF DESIGN OF APPROACH TO AID THE PLANNING, PREPARATION AND RUNNING OF A LEARNING SESSION	4
INTRODUCTION	6
DESIGN	7
1. Design of the process required to identify a desired result, or goal	7
Goal clarification.....	8
Goal evaluation	9
Identification of the desired goal.....	10
2. Identification of the steps required to plan a learning session that reaches the desired result...	10
Collect Information and Ideas.....	11
Evaluate information and ideas	11
Apply teaching principles.....	12
Apply permaculture principles.	12
Plan learning experiences	12
Practice learning session.....	12
Implement, Evaluate and Tweak learning session.....	12
IMPLEMENTATION OF THE DESIGN	12
References.....	21
APPENDIX	22
Supporting documentation	22
Workshop contents	22
Description of Drawing Connections Project.....	30
Some important teaching principles used during the design.	30
ASSESSMENT OF THIS DESIGN	33
Evaluation	33
How this design meets the Ethics and Principles of Permaculture	34
Assessment of Individual Design for Feedback Table	34
FIGURES	
Figure 1 Collage of some artwork produced during the "Drawing Connections" project.	7
Figure 2 Flow chart of process to clarify and identify desired results and SMAART goal	7
Figure 3 Flow chart of steps taken when planning a learning session	10
Figure 4 Figure 4 Woodland walk taken after talk.	18
Figure 5 String game in action.....	18
Figure 6 collection of some of the artwork created after the talk.....	19
Figure 7 A quick and effective piece of art.	19
Figure 8 Feedback form for workshop.....	20

TABLES

Table 1 Outline of the points a SMAART goal should address.....10
Table 2 Action Learning Cycle analysis of design33

OVERVIEW OF DESIGN OF APPROACH TO AID THE PLANNING, PREPARATION AND RUNNING OF A LEARNING SESSION

Design Aims and Objectives

Design an outline framework or frameworks which increase the efficiency and thoroughness of the preparations required when planning a learning session.

Project Outline

1. A design for improving the approach to preparing for a learning session will be developed.
2. The design will be implemented during the preparation of a learning session.
3. The learning session will be run.
4. The design and session will be evaluated.
5. Any necessary tweaks to the design will be made, so completing the design for use at this point. However, it is accepted that further use of the design may result in more evaluation and tweaking of the design .

In this case the design will be developed and then tested on the preparation and running of an introductory learning session for “[Drawing Connections](#)” as a part of the “Learning Together” project run by [Cambridge Centre for Teaching and Learning](#). This is a project which aims to forge connections, through art, between residents of Springhill Open Prison and two groups within the local community (artists and students) who might not otherwise meet. It is a project which aims to help prepare prisoners for release to the outside world.

Design Outline

The design created is essentially what is called a “Backward Design” because it starts with identifying the desired end.

It is broken down into two parts:

1. **Designing of the process required to clarify and identify the desired result, or SMART goal.**
2. **Identifying the steps required to plan a learning session that reaches the desired result** (using the design framework CEAAP Collect information, Evaluate information, Apply teaching principles, Apply permaculture ethics, principles and approach strategies, Plan)

Accreditation and Complementary Criteria involved

Demonstrating Design Skills.

Administration and Organisational design.

Community Development

Art, media, Culture and Communications

Education

Personal Development and Inner Transition.

Holmgren Domain involved

Education and Culture. Health and Spiritual Well-being

Permaculture Ethics and Principles involved

- **People Care.**

- **Observe and interact, Catch and store energy, Obtain a yield, Design from pattern to detail. Creatively use and respond to change.**

These are looked at in more detail [here](#).

Methods used

Thinking tools: SMART goals (Specific-Measurable-Agreed upon-Attainable-Time bound),

Design frameworks: “Backward Design”, CEAPPIET (Collect information- Evaluate information-Apply teaching principles-Apply permaculture principles-Plan schedule-Practice-Implement-Evaluate-Tweak).

Evaluation of design: Action Learning Cycle (Design-Implement-Observe-Reflect (Went well? challenging? Long term goals? Next steps?))

Evaluation of the Drawing Connections workshop: Feedback forms, Discussion, 4P’s (Process-Product-Personal-Peers).

Results Summary

The design process resulted in:

- Helping me to organise my thought processes and preparations by taking a designed approach.
- A better learning session than I would otherwise have prepared with good feedback and results.
- The production of a very helpful resource for future learning session preparation
- Increased self confidence in teaching

Evaluation Summary

The design works for me and made my approach more professional than it might otherwise have been. It could of course be improved but with the basic outline in place it will be easier to add considerations and ideas as I gain experience. I had done the L3 Award in Education and Training but the research I did for this design introduced the idea of “backward design” which seemed so logical and made absolute sense to me.

Reflection

I am happy with the design as it stands but imagine that I might have some tweaking to do once I have used it more in more exacting teaching situations. Backward design is an approach that I believe needs emphasising more in permaculture design. I will put more emphasis into identifying the desired result of a design to be in future.

Self-Assessment

I have learnt quite a lot about how sitting down and taking time to design a process actually helps to straighten out all the ideas that are flitting around in my head. I think it is a time-saver in the long run but it also encourages better outcomes. I find it hardest to get aims, objectives and desired goals pinned down and clear in my head and this can sometimes cause me a lot more work. This is one of the reasons why I chose to do this design.

INTRODUCTION

This design aims to create an outline framework or frameworks which increase the efficiency and thoroughness of the preparations required when planning a learning session. This project will:

1. Develop a design for improving the approach to preparing for a learning session.
2. Implement the design during the preparation of a learning session.
3. Run the prepared learning session.
4. Evaluate the design and learning session.
5. Make any necessary tweaks to the design,.

When I was first asked to do a workshop to introduce the project entitled [“Drawing Connections”](#) I was reluctant due to time constraints and because there were other things I wanted to do. When I realised I would be given a pretty free reign I thought I could probably achieve multiple gains, for example:

- Design an approach to planning learning sessions and present it in a way that would be useful to me, and hopefully others, in the future.
- Revise and research tutor training.
- Provide a design which, when presented in my DIP portfolio, added a new dimension to the design mix.
- Produce a workshop that could also be used in other situations and by other people.
- Do more research on a subject I was interested in.
- Introduce permaculture to a new audience

Teaching is a lot about people care, it is an opportunity to look after and help others and make a difference to their lives so it is really important to make the most of the opportunity and prepare well. To do this preparation tutors design, they design learning experiences aimed at achieving a desired result. Given that preparing a learning session is a lot of hard work it makes sense to actively design a process which makes the preparation process easier and more thorough. The design that follows is for designing any learning session. The Drawing Connections workshop presented is designed, implemented and evaluated using the design.

Figure 1 Collage of some artwork produced during the "Drawing Connections" project.



DESIGN

There is so much to know about teaching that this design cannot include everything, it therefore only aims to provide a well-designed outline approach. An overview of the most important principles and points to consider when designing a learning session are included in order to make this presentation useful in its own right as a reference document for designing other workshops etc..

This design is essentially a flow chart to keep one on track and help with remembering the basic things that need considering.

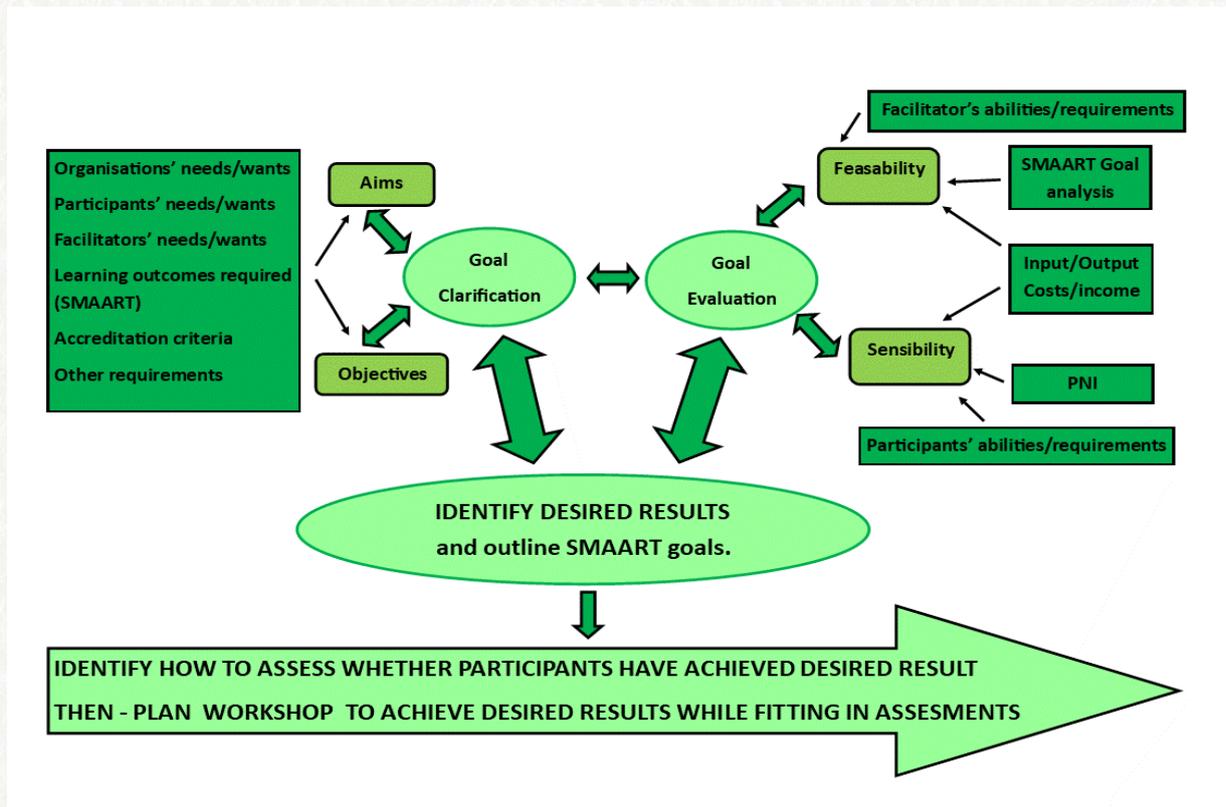
This design incorporates the ideas of “**Backward Design**” which means one starts by having a very clear understanding of the desired result. It has the advantage that you know exactly what you are aiming for so the steps you take are always in the right direction.

This design falls into two parts:

1. **Designing of the process required to identify a desired result, or goal.**
2. **Identifying the steps required to plan a learning session that reaches the desired result** (using the design framework **CEAAPPIET** Collect information, Evaluate information, Apply teaching principles, Apply permaculture principles, Plan schedule, Practice, Implement, Evaluate, Tweak).

1. Design of the process required to identify a desired result, or goal.

Figure 2 Flow chart of process to clarify and identify desired results and SMAART goal



Goal clarification

Clarify organisations' needs/wants

- The organisations' needs are usually a starting point for planning. Their needs will range from educational, such as the curriculum to follow, level to be attained, time allocation etc. to care of the learners, such as safeguarding, support etc. to organisational, such as record keeping, budgets available etc.

Clarify Learners' needs/wants.

- Teaching should be learner-centred. The learners needs and wants are a major consideration when designing a learning session and many points need considering during the planning stage. The desired result must be adjusted to fit the abilities, wants and needs of the learners.
- Many of the teaching principles overlap with permaculture principles and relate to **people care** and the ways in which people learn. The most important issues to consider when planning a learning session are presented in the section on [teaching principles](#) in the appendix.

Clarify Tutors' needs and wants

- There are the basic things like knowing what you are meant to be teaching, when, where and for how long and what assessments are required. However, tutors also need to know what resources are available such as support workers, materials, venues., IT etc.
- What the tutors might require in order to achieve the learning session's desired result should be assessed so it can be decided at an early stage whether supplying their requirements is feasible.

Clarify Learning Outcomes and Accreditation Criteria

- This will probably come under the “Organisations’ needs/wants” headings but may not in certain circumstances. Learning outcomes should be **SMAART** (Specific, Measureable, Attainable, Agreed upon, Realistic, Time-bound). The learning outcomes might cover more than one session. They must cover the accreditation criteria required for accreditation if it is an accredited course.
- Bloom (1956) identified [six progressive levels of learning](#) and clarifying the level required should be an early step when deciding on the desired result for a learning session.

Clarify Other requirements

- There may be **laws** that need to be considered, for example the Children’s Act or **regulatory requirements** specific to the organisation, or **codes of practice** which need to be followed.
- Health and Safety and Safeguarding issues can vary greatly with subjects, learners and circumstances but there will almost always be a requirement to comply with a variety of rules.
- As a general rule, care needs to be taken relating to the copying, adapting and distributing of materials that may be protected by the Copyright Designs and patent Act (1988).

All of these types of issue might affect what can and cannot be done and so impact on what desired result may be achievable.

Goal evaluation

Evaluate tutors’ abilities

- Tutors need to know the subject of the session well. They also need to know effective ways to deliver and assess their subject to promote learning. The knowledge and ability of the available tutor may affect what “desired result” should be aimed for.

Evaluate learners’ abilities

- The learners need to be capable of achieving the learning session’s goal and this needs to be assessed. There is no point in planning a learning session that the learners cannot understand, or take a positive part in etc. Equally, there is no point in planning a learning session where the learners already understand the desired result, or it is at too low a level for them.
- Learners need to be interested in achieving the desired result and this may require changing the desired result to create the interest.
- Personal issues need to be considered, for instance: Are there any special needs and if so is there enough personal and/or learning support available for learners to achieve the desired result?

Evaluate feasibility of learning session

- There has to be a tutor with the required knowledge, resources and venue to make the desired learning session feasible. There also need to be the right learners wishing to attend, able to pay if required and able to reach the venue.

Evaluate sensibility of learning session

- The inputs required to make the learning session a success should be worthwhile for what will be achieved (outputs). What the positives, negatives and interesting (PNI) things about the learning session are should be assessed and considered before starting the planning.

Identification of the desired goal

- The goal clarification and goal evaluation have to come together to arrive at a desired result, or goal. The goal must fit with all the above points and it needs to be **SMAART**.
- Not everything can be covered in a subject so what is to be taught and what is to be left out has to be decided upon at this point. This will involve prioritising so the desired goal should clarify, for example (in order of importance) :
 1. what is the lynch-pin knowledge or skill learners need to retain?
 2. what is the important knowledge or skill required to accomplish key requirements?
 3. what is worth being familiar with?

Table 1 Outline of the points a SMAART goal should address

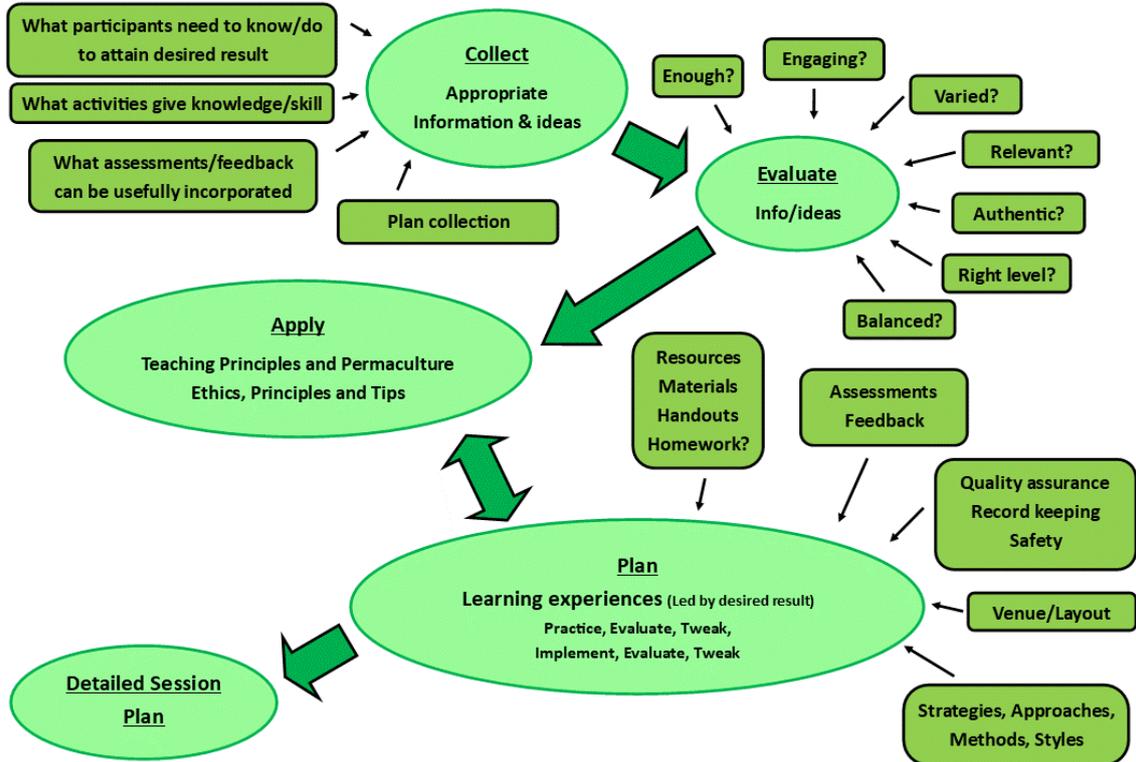
Desired result, or goal, SMAART analysis
Specific , Are the objectives, clearly defined and stated in order to meet the desired results?
Measureable , Can the objectives be achieved at the right level for the learners and the level required by the organisers?
Attainable , Can the objectives be met by the tutor and all the learners?
Agreed upon , Are the objectives what the organisations involved and tutor have agreed upon? Will they allow for the required learning outcomes?
Relevant , Do the objectives relate well to the desired results, the subject being taught and the learners?
Time bound , Can the agreed target dates and times be met?

The desired goal is extremely important as all the planning of the session and assessment of learning will revolve around the desired results.

2. Identification of the steps required to plan a learning session that reaches the desired result.

The design framework used is **CEAAPPIET** (Collect information- Evaluate information-Apply teaching principles-Apply permaculture principles-Plan-Practice-Implement-Evaluate-Tweak)

Figure 3 Flow chart of steps taken when planning a learning session



Collect Information and Ideas

- Deciding what to collect and what to leave out is a big part of this phase. Carefully prioritising information to fit the priorities of the desired goal can save a lot of time spent collecting information that will never be used. It is a good idea to think about what the learners know already and then follow the priorities identified in the desired goal.
- It is then possible to look explicitly for information and activities that give the knowledge and skills required to reach the desired goal.
- The most relevant assessment and feedback methods (which should be incorporated throughout the learning session and also provide part of the teaching process) can also be efficiently collected.

Evaluate information and ideas

- Is there enough information to reach the desired goal in a thorough way?
- Is what you have authentic? If using the internet it is easy to pick up false information so real care needs to be taken here.
- Is it relevant to the subject? It is often nice to add asides but time is usually too short for all that needs to be learnt. It might be useful to have some related and interesting information kept aside for discussions and group work situations. However, if aside information helps with memory of an important point then it is well worth incorporating
- Is it of the right level for learners and to reach the desired goal?
- Is it engaging? If not, and it is of high priority, then finding a way to make it engaging is important.
- Is it balanced? Teaching needs to give a balanced view and it is easy to find distorted information where people have an agenda. Even if information is authentic it may be presented in a biased way by omitting other information or putting more emphasis on some.
- Is it varied? The more varied the information, the more likely that learners will be engaged. Different individuals will find different things more memorable.

Apply teaching principles

Much research has been done on what affects people's learning abilities and this has led to many teaching principles. These are aimed at ensuring conditions and approaches to teaching facilitate learning by a diverse group of learners. The most important basic teaching principles are covered [here](#).

Apply permaculture principles.

All of these will apply to teaching at some time and it is good to consider each one when planning a learning session. It is also good to consider using the various design frameworks, thinking and analysis tools for the different situations that arise.

Plan learning experiences

With a clear description of the desired outcome and having collected the relevant information and ideas it is necessary to work out how to present the subject. With the teaching and permaculture principles in mind the process should be much clearer and more thorough than it otherwise would be. There is still a lot to consider (strategies, approaches, methods, styles, resources, materials, handouts, homework, assessment strategies, feedback processes, quality assurance, record keeping, health and safety, safeguarding and more) to create a detailed session plan. However, the road taken to create the session plan should result in a learning session that covers exactly what the learners need to cover and understand to reach a well-defined, desired goal.

Practice learning session

Practicing the learning session allows you a fresh view of the session. You can check how long it will take and discover pitfalls such as difficult words and points to get across. It helps to reduce nervousness and makes you appear more professional. If possible it is good to practice on someone and get critical feedback.

The use of the Action Learning Cycle (**Observe-Think/reflect-Design-Implement-Observe etc.**) during this process is worthwhile.

Implement, Evaluate and Tweak learning session

It is good to evaluate the design and the lesson and tweak when everything is fresh.

The [Teaching Learning and Assessment Cycle](#) (Identifying needs-Planning Learning-Facilitating Learning-Assessing Learning-Evaluating Learning) which revolves around the learner is appropriate for evaluating the session with regards to the learner.

The [4Ps Analysis](#) (Process -Product-Personal-Peers) is good for analysing the lesson, teaching process and tutor,

[Feedback forms](#), outcomes from **assessments** and **informal discussion** are also important. It is good to ask the learners for their views.

IMPLEMENTATION OF THE DESIGN

Planning, delivering and evaluating a workshop for the “Drawing Connections” project

*The planning and evaluation of this workshop tests the design developed using the ideas of **Backward Design** and **Permaculture Design**.*

The workshop was run by myself and the “Drawing Connections” project convener Rebecca Lindum Green.

It was presented to two prison staff, 6 prisoners and 6 students from the local art college. It was held inside Springhill Prison grounds in Hertfordshire.

1. IDENTIFICATION OF THE DESIRED RESULT, OR GOAL

GOAL CLARIFICATION

Clarify organisation’s needs and wants

I discussed what was basically required with Rebecca.

We also discussed the contents of the other learning sessions that this learning session was to be an introduction to. This helped to give an outline idea of what was required to link everything together with the idea of “Drawing Connections”

It was agreed that the participants were not there to learn as such but to be introduced to ideas ([Bloom’s Level 1 - Knowledge](#)) and that no assessment of learning was required.

There is a small budget that will probably cover expenses, but I should ask before buying anything when I am closer to knowing my needs.

I don’t need to keep any records but there will need to be feedback forms filled in at the end of the session.

There will be a follow-up get together at the end of the project to celebrate our achievements.

Rebecca will be responsible for taking photographs.

The time allowed for the workshop is 3hrs broken up between Rebecca and myself.

The second half of the session will be a gentle and informal introduction to practical art which allows people to mix, chat and discuss anything from the first part of the session.

Clarify learners needs and Wants

We spent an informal afternoon with the prisoners, students, prison staff and other learning session leaders to get a feel for people’s hopes for the project as a whole. We also gauged people’s requirements and abilities. This was good for relaxing people and forming connections between prisoners and students in particular.

We visited the main lesson venue, the meeting room in the Eco-build, and the prison grounds to see the venue and site. I discussed the use of the grounds with the prison staff and can use the woodland and the Buddha garden for any outside work. I can rearrange the furniture inside.

We should be able to provide enough care for participants to reach the highest of Maslow’s “[Hierarchy of Needs](#)”

Rebecca asked if people would like to start each session with some Tai Chi and the participants were enthusiastic about this idea. We agreed to introduce three new moves at the beginning of each session, so completing the 18 move cycle over the project.

None of the learners are known to have any special requirements or needs and no learning or personal support should be required.

Clarify tutor's needs and wants

I want to use this workshop to introduce people to permaculture and nature in order to try to make people care about our planet more and so hopefully look after it. I also want to promote cooperation and reduce the idea that success in life is about being competitive and winning

Clarify learning outcomes and accreditation criteria

This learning session is aimed at a group with diverse abilities and I only have to give a general introduction to the idea of making connections with other people and the natural world. How I do it is up to me (but the outcomes should still be SMAART)

This learning session is not part of an accredited course and no specific defined learning outcomes are required.

Clarify other requirements

For this learning session there are some regulatory requirements:

- *We cannot bring in any electronic equipment or mobile phones.*
- *Everything being brought in has to be agreed upon before the date of the learning session.*
- *Everyone and everything has to be signed in and out.*
- *No photographs in which prisoners faces are revealed can be taken.*
- *We have to stay with the group.*
- *Health and Safety issues require prison staff to be present.*
- *We must bring ID in order to get in to site.*

GOAL EVALUATION

Evaluate tutors' abilities

I believe that both Rebecca and I are capable - providing I plan well and practice. The venues at our disposal, equipment, time and support from prison staff will make a good quality learning session achievable. Everyone seemed really helpful and friendly in the introductory session.

Evaluate participants abilities

In this case the abilities of the different participants is not well known and likely to be very diverse. There are no people deemed to have special needs. The ages range from those in their 20's to those in their 80's. Bloom's learning level 1, of just imparting knowledge, should be appropriate for this situation. The participants do not have to show any learning but there should be plenty of informal time for questions and discussion, including 1 to 1 with me if possible so those wanting to learn more can..

Evaluate learning session feasibility and sensibility

*In this case I am not responsible for making decisions on how feasible, sensible and worthwhile the learning session might be for the organisations and the participants. I have informally evaluated it, over quite a lengthy period, from my own point of view and decided that there would probably be a positive **Directive of Return**, i.e. the energy I put into it would be worth the results over time.*

Identify the desired goal

In this case there is no lynch-pin knowledge or skill the participants need to retain. There is no important knowledge or skill required for them to accomplish the key aims of this workshop.

The desired result is to:

- 1. Integrate everyone so all the participants can form connections and work well together as a group.*
- 2. Get participants to express themselves to others.*
- 3. Make people think about how connecting with others and cooperating is a more fulfilling way to live.*
- 4. Encourage participants to see themselves as a good and equal part of a greater whole.*
- 5. Develop and broaden artistic skills*
- 6. Introduce permaculture to a new audience.*

SMAART analysis of objectives of the session.

Specific, *The objectives are to:*

- 1. Relax people and provide them with the time, space and situations which are conducive to allowing them to form connections with each other and build empathy.*
- 2. Inform people of how important the use of cooperation and connection is in the world.*
- 3. Use an art project (which required little artistic ability) for people to express themselves through, knowing that their work will be a part of a collage, so forming a piece of group art.*
- 4. Present the idea that if we all work together we may be able to do something great that is impossible to do alone.*
- 5. Present permaculture design in a broad way.*

Measureable, *In this case the objectives are not required to be measureable.*

Attainable, *The objectives can be met by the tutors and all the participants.*

Agreed upon, *The objectives of the organisations' and my own have been agreed upon? They do not need to allow for any specific learning outcomes.*

Relevant, *The objectives relate well to the desired results.*

Time bound, *The agreed target dates and times can be met.*

2. STEPS TO TAKE IN ORDER TO PLAN A WORKSHOP THAT REACHES THE DESIRED GOAL

Collect information and ideas

I chose a subject where I was happy to do lots of research and could then pick out the best bits for the talk. I also had a very flexible remit and so could have adapted this to the information I gleaned. As a result this difficult phase was relatively easy and less structured for me. However having decided on the content it was really useful to go back and see which pieces of information were most useful in attaining the desired goal I had set myself.

Evaluate information and ideas

Evaluating the information I think it is really interesting and some of it extraordinary. It is relevant to the subject and I hope to the right level - all of the participants appeared to be pretty bright people when we met for the introductory session.

Most of my information came from the book "The Hidden Life of Trees" by Peter Wohlleben which has good referencing to scientific research. There were some points taken from the internet and it was surprisingly difficult to verify some of it.

Apply teaching principles

This workshop is really about looking after people and opening minds. As a result Maslow's "hierarchy of needs" is an important teaching principle to keep in mind. The use of the Tai Chi should act as an ice-breaker. The venue is very good I am able to rearrange the tables and chairs so we are all facing each other while still allowing for personal space. The string activity will connect people. The walk will energise people and allow them to chat and reflect on what they have just heard before they start the art work. Tea and cake promotes chat and connections to be made. Informal art where nothing more than marks on paper is required allows for a relaxed atmosphere and approach. The individual activities are short and none require writing. Copies of the talk will be made available to all afterwards. There will be a celebratory get together at the end of the project where collages of the art will be on display.

Apply permaculture principles

*People care is the most obvious principle I need to attend to along with **Integrate rather than segregate**. **Apply self-regulation and accept feedback** is important and I have made feedback forms (see appendix) for the participants to anonymously give feedback on.*

Plan learning activities

Timetable

- 1.00pm Start, check-in.
- 1.10pm Tai Chi Qigong Shibashi (first three movements)
- 1.20pm "From Trees to Whales" talk with string game
- 1.45pm Play with string web and globe
- 1.50pm Relax, close eyes, I read the poem "Shoulders"
- 2.00pm Go to woodland to collect natural materials
- 2.20pm Return, informal break with tea and cake.
- 2.30pm Art work
- 3.40pm Feedback/Evaluate
- 4.00 Finish.

Resources

***Me to bring** - Large ball of coloured wool, blow up globe, talk in card format, "Shoulders" poem, feedback forms, ID for gate.*

***Rebecca to bring** - Tai chi instructions, art materials, refreshments, cups, bags (for woodland collections), camera, ID for gate.*

Practice, Evaluate and Tweak

The talk difficult is difficult and a bit long winded. I have broken it down into a format that can act as short almost individual sections. With each short fact put on separate cards they

can be used more like a game than a talk and it will be much easier to work from and less formal too.

Implement, Evaluate and Tweak

The implementation of this workshop went really well, with lots of chatting and a very positive atmosphere. It was difficult to believe that only some of us were going home that evening.

EVALUATION OF WORKSHOP

Process	<i>The design process really did help me. I have a pretty logical brain and so following a well outlined logical process was comforting as well as being more efficient. Being able to break the work down into sections made it easier to get to grips with. It was altogether less daunting a process with the design to follow. I believe I was more focused on the correct result. Crystallising what the desired result was and what the specific objectives required to obtain the desired result were really made me focus and concentrate.</i>
Product	<i>The design for the workshop was successful, timings worked well and content appeared to be interesting to the participants. Doing the talking and string game together would not have worked if the participants had to fully comprehend (Blooms level 2) the material. People were glad that they could have a copy of the talk to read at leisure, which I took to be a good sign that their interest had been sparked. The feedback forms didn't work in terms of easy analysis. I think it might have been better to stick to a very simple "Rose, bud, thorn" (positives, potentials/interesting, negatives) style of feedback where more could be written. If assessment had been required and so incorporated into the workshop it might have helped with analysis of the product.</i>
Personal	<i>It was a great learning experience for me and really interesting to work in a prison. I felt enthused to try more workshops.</i>
Peers	<i>The workshop was deemed to be a great success. The prison staff were very impressed and were talking about running a similar project again. It was nice to hear that the prisoners had been enthusing about it to others in the prison. Informal discussion during the woodland walk and art period indicated that people found the fact about trees fascinating and I felt that my message had hit home with many participants. The feedback forms showed that people were very happy with the workshop.</i>
Whole project achievements	<p><i>Some points stand out:</i></p> <p><i>At the end of the 6 sessions people were really very connected, chatting and joking together and sad to be parting. One was asking about the online PDC course.</i></p> <p><i>Two of the prisoners benefitted enormously, really coming out of themselves. One said he had never worked as part of a friendly group in his life before!</i></p> <p><i>The prison have cleared a store room to make into an art room as a result of the project.</i></p> <p><i>One of the students wants to donate some art materials and continue to come in to the prison to share art projects.</i></p>

Figure 4 Figure 4 Woodland walk taken after talk.



Figure 5 String game in action.



Figure 6 collection of some of the artwork created after the talk.



Figure 7 A quick and effective piece of art.



FEEDBACK FORM

Figure 8 Feedback form for workshop

Please draw a line from the question boxes to the most appropriate answer or face. If you want you can add comments too. For the feedback to be anonymous you don't need to add your name, but you can if you want to.

Many Thanks. Charlotte

Were the tutors organised/prepared?

Do you feel you understand what Permaculture tries to achieve?

Would you recommend the day to a friend ?

Were the subjects communicated clearly?

Were talk and activities well chosen for Drawing Connections?

How would you describe the talk?

How happy did you feel about the day as a whole?

Did the day give you ideas, knowledge or skills you would like to follow up?

How happy were you with the type of art project presented for this first day of the Drawing Connections project?

Did the day help you draw connections with each other?

Did the day help you connect with yourself?

Might you follow up and learn more about Permaculture?

How happy did you feel about the tutors' manners and attitudes?

Did the day help you connect with Nature?

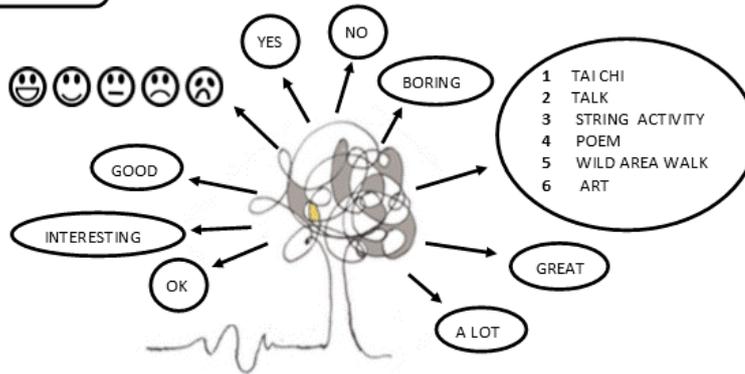
Will the day change the way you make connections in life?

Which part of day was most rewarding/interesting?

How happy did you feel about the art you created?

Which part of day was most enjoyable?

Which part of day was least enjoyable?



Drawing Connections "From Trees to Whales"

Thank you for your feedback

References

- People and Permaculture*. Looby Macnamara. Permanent Publications 1998
- Permaculture, A designers' Manual*. Bill Mollison. Tagari Publications. 2009
- Permaculture Design, A Step by Step Guide*. Aranya, Permanent Publications 2012
- Diploma in Permaculture Handbook*. Wwww.Permaculture.org.uk
- The Award in Education and Training*. Ann Gravells, Sage Publications 2013
- Earth Users Guide to Teaching Permaculture*. Rosemary Morrow, Permanent Publications 2014
- The classification of educational goals*. B S Bloom, McKay (1956)
- Teaching and Learning Preferences: VARK strategies*. N. Fleming, Honolulu, Honolulu Community College (2005)
- Experiential Learning: Experience as a source of learning and development*. D A Kolb, Prentice-Hall (1984)
- Motivation and Personality (3rd ed.)*. A H Maslow, Pearson Education Ltd. 1987

<http://www.bloomstaxonomy.org/Blooms%20Taxonomy%20questions.pdf>

<http://www.classvr.com/wp-content/uploads/2017/02/the-pyramid-of-learning.png>

<http://sguditus.blogspot.co.uk/>

<https://online.stu.edu/lesson-plans-using-backward-design/>

<https://knowledgebase.permaculture.org.uk/resources/books/permaculture-teachers-handbook>

<http://i2.wp.com/teachonline.asu.edu/wp-content/uploads/2012/07/for-embedding-BLOOMS-LEVELS-OF-LEARNING-color.jpg?resize=528%2C366>

APPENDIX

Supporting documentation

Workshop contents

1) INTRODUCE MYSELF and give a short description of permaculture design and why I feel it is important.

2) FROM TREES TO WHALES talk/string game.

I want to start with a Thank you to the trees of this planet.

Why should we thank trees?

As far as we are concerned it is trees that are largely responsible for supplying the air we breathe, the soil we have grown our food in for centuries and the fuels that keep us warm. They provide us with wood for our cradle, our home and even our coffin. They supply us with apples, oranges, olives, avocados, nuts, plums cherries and more. They make chemicals we use for all sorts of things including medicines – it may be a tree we have to thank when we are cured of breast cancer and a host of other illnesses. They inspire art, literature and music but more importantly they can teach us how to live and that's really why I have chosen trees for today's talk.

Permaculture designers tend to be humble, we accept that it is likely that the best ideas are not ours but that they have already been invented – by Nature. So we look really closely at Nature to see how it works and what it does because after all it has spent 3.8 billion years working out what works and lasts. To us it makes sense to take to look for our inspiration and ideas from these earth savvy organisms. For instance they waste nothing, they upgrade everything, they don't pollute their home.

We find that In general nature banks on diversity, it uses lots of interactions and connections and it rewards cooperation so that's what we try to do in our designs.

This project is about connections and these can be positive or negative and both are found in Nature. In the past we were educated and conditioned to look at nature with emphasis on species and individuals competing against each other for food, light and shelter etc. However, as we learn more and look at the connections between individuals and between species we are finding that life is far more complex and that joining forces in order to survive is far more prevalent than competition. It is in fact at the core of survival. Competition definitely exists and is a part of the survival strategy used in Nature but more important to survival is cooperation.

We are also discovering, that nothing in Nature works well alone. Nature makes masses of connections and it is found that the environments with the most connections (NOT the most species or individuals) are the most stable ones. For example you can live in a busy city and have connections with no-one and if you break a leg no-one will bring food and supply the help you need. If you live in a small village but have positive connections with people then if you break your leg many people will bring you food and supply the help you need.

I don't know why, but even in a woodland trees somehow appear to us to stand alone as individuals, They appear to be very self-sufficient organisms, perhaps it is because of their size and majesty.

Trees often instill some sense of wonder in us - but perhaps, if we think about it, the real wonder is that we can see these trees and not be far more in wonder of them. People in the past revered them far more than us and I hope that today I'm going to be able to make you be more in wonder of them.

Trees like trees, they need to reproduce so need other trees but also without other trees they are at the mercy of the weather. As a forest – or community of trees, they moderate heat and cold, they slow strong winds, they generate humidity, even cause rain to fall and create and retain wonderful soil. So trees have developed strategies to look after each other and the other life forms which are good for their community. To do this they make lots of positive connections voluntarily and involuntarily. Trees do not stand alone given the choice and just take what comes they work with others to form stable conditions suitable for their community.

3) STRING GAME where the ball of wool is thrown each time a connection is made by trees.

20 cards to use as examples

1. Trees can communicate with each other. In Africa when Acacia trees are being eaten by giraffes they produce a warning gas that forewarns the trees nearby. You might ask Why? The trees can't run away. However, trees can produce toxic, unpalatable chemicals in their leaves but this takes some time so if the neighbours are forewarned that a giraffe is coming they will be better protected.

The trees are sending warnings by scent-mail.

2. It has been shown that with many species of insect, trees can accurately identify which species they are from their saliva as they eat them, the tree then releases fake pheromones that summon specific beneficial predators. So rather than shouting for help the tree sends a scent-mail which can travel far on a breeze inviting a specific species to come to dinner.

Question – If trees can identify saliva, do they have a sense of taste?

3. Trees and certain fungi in the soil have very close connections in all sorts of ways, they are best mates and in fact the fungi often move in growing right inside the root tips of the tree for a better connection. There are infinite biological pathways in the soil in the form of

fungal networks. One teaspoon of soil contains many miles of microscopic fungal filaments. They extend far further than the tree's root system and actually forms what can be thought of as a "Wood Wide Web" Trees are known to use this wood wide web created by the fungi for sending chemical warnings and signals to other trees.

Much like our telephone system.

4. Trees work together sending signals to flower at the same time so pollination is as successful as possible. This is done using hormones which travel through the root and fungal network which exists in the soil.

If you are going to have one 2 week orgy in the year then it's a good idea for everyone to know the date and be ready for it.

5. Many trees also need pollinators such as bees and butterflies to come or it won't be an orgy, there are over 250 species of bee in Britain and trees need to make connections with these. Trees signal to the pollinators using, colour, scent and form and they provide nectar as a reward. So trees are effectively producing scents which will carry long distances to attract pollinators into the area and then using pretty visual signs like waving flags to say here I am and when they get to the flower it has the structure and marks which directs the pollinator to the exact spot.

Effectively trees use postmen (which travel by air rather than in little red vans) to carry their sperm and they pay them with nectar rather than with stamps.

6. Interestingly, some trees produce nectar in their leaves. The bird cherry does this for ants which live with it. The ants live on the nectar and also like a bit of meat such as the animals like caterpillars and aphids that are trying to eat the tree. There's another tree species that also harbors ants. It has hollow thorn like structures which are houses for ants which it provides for exactly the same purpose. It gives the ant a safe home so it stays and the ant eats the pests.

Exactly the same as us keeping a cat to deal with the mice that keep raiding our kitchen cupboards.

7. Different species of tree are also in contact with each other even if we might think that they would be competitors because they live in the same place. It has been shown that paperbark birch and Douglas fir trees look out for each other. In late spring and summer the birch tree has plenty leaves and so can make plenty of sugars through photosynthesis, if it is with fir trees it will give some of this food to the fir. The Fir has leaves which are less efficient but are at least there in winter and early spring and during this time it pays the birch back.

Win-win situations like this abound in nature, they are what we try to create in permaculture design and we should look for them in our lives too.

8. Trees can physically support each other. In places where the soil is very loose such as on beaches then there are trees adapted for this environment which grow their roots into a single massive network which prevents them all from falling over when a storm comes.

Much like us holding on to each other on very windy days

9. Trees have been shown to be able to recognise their own kin, so they have special family connections too. They send food to their offspring and reduce their own root competition where their offspring's roots are. The offspring are often quite close and when the parent tree is dying or injured it will send defense compounds to the kin which increases their resistance to future stresses which it will have when the mother tree falls.

It is like leaving everything in order and a will which will help your child support itself when you know you are dying.

10. Trees work so closely with some fungi in the soil. A tree can give up to a third of the sugar it makes to these fungi. But in return the fungi act as an extra root system and one that is particularly good at bringing water and nutrients to the tree. Fungi can't make sugars though so the tree and the fungi have developed a trading partnership.

Just the same as when I swap my home-grown vegetables for eggs with the lady next door who keeps chickens.

11. If things get dire and nutrients are in short supply there are fungi which will kill organisms in the soil so releasing their nutrients for the tree and themselves.

That's friendship.

12. Trees also exude sugars into the soil providing a buffet for lots of other organisms. There are millions of these in a handful of soil and as a whole group these organisms are responsible for breaking down matter such as leaves, dead animals faeces etc. into molecules that are able to be used by the tree. If these organisms are close to the trees roots (because of the sugary treats on offer) then the nutrients the organisms excrete are deposited right next to the root where they can be absorbed.

It's a bit like an under 18 year old inviting a group of friends over for dinner because you know they will bring beer and wine which you are too young to buy yourself.

13. Trees need to travel and, as they can't move as individuals, lots use the wind to disperse their seeds but many make connections with animals. For instance some produce nuts which animals such as jays and squirrels collect and bury for winter use – or plant if you look at it from the tree's point of view. Some of these are forgotten or not needed and left to grow. A squirrel will carry a nut several hundred yards and a jay several miles. Many trees produce berries that birds, badgers, deer, mice etc. eat and transport and excrete the seeds of in other places.

So unable to move themselves trees have offered to pay for something else to carry their seeds to a new place just like they did with their sperm. Rather than nectar it is fruit and nuts these couriers get paid with.

14. Trees use the sea too like the coconut tree which produces really tough seeds that float and can wash up on another beach miles away and even in a different country.

So they could be seen as using sea-mail.

15. Trees use us too. We are not exempt from being tempted into a relationship by trees. If we look at the apple tree we can see we have close relationships with it We are used in just the same way as the bees and squirrels The apple tree is native to Kazakhstan (between Russia and Afghanistan), now it is all over the world thanks to us. The apple tree connected with us by producing fruit we wanted so we took it with us and planted it wherever we went. We wanted it for cider making and for food and sweetness. Over the years we have bred different varieties and increased its genetic variation making it suitable for a diverse range of habitats and increasing its chances of survival on this planet massively.

We are so closely connected to the apple tree that we even use the apple as a symbol in the story of Adam and Eve in the Bible.

16. Leaf fall from trees is often the basis for life in cold water rivers feeding millions of invertebrates which in turn feed the fish and so us and otters and bears etc.

17. Trees are important for birds for roosting, safe resting places, nesting sites and vantage points. A Kingfisher sits on branches to get a good view into a stream for fish. Hawks use trees to perch in while they eat their prey. I have an example of a permaculture design which highlights the importance of perches. In an area where all the trees close to a village had been chopped down for firewood for cooking and only grass remained. It was decided to replant trees. All the planted trees were killed by voles ring-barking the saplings, they could dig and nibble their way under the tree guards and eat the juicy young bark. This presented a conundrum, people couldn't kill all the rodents in the area or make a vole proof fence?

Luckily a permaculture solution was found. They looked closely at this area and other similar areas where the problem didn't exist. The answer became obvious – there were no trees for the hawks to sit on and rest and eat their prey. So people put up tall poles and strung rope between them as mock trees. The hawks came and reduced the population massively and didn't give the voles the peace and safety they needed to nibble under the tree guards and ring-bark the saplings.

That was the end of the party for the voles.

18. Trees are connected to hundreds of organisms that they provide a home for. One large tree was sprayed with insecticide and it was found to contain over 2000 individual invertebrates belonging to 257 species. This wasn't because it was some special giant tree in a tropical forest. Our common Oak trees are known to act as hosts for 284 species of insect, 324 species of algae, mosses and lichen and to provide food for all sorts of animals with their dropped acorns and for thousands of soil organisms with their dropped leaves.

So a tree is not just a tree it is a whole community.

*19. Trees are super important even when dead. About 6,000 species depend on dead wood for their survival. **This is about a fifth of the world's species.***

*20. Number 20 – **LAST BUT NOT LEAST.***

I called this talk “From Trees to Whales” because I think it emphasises just how far-reaching the connections can be. In Japan there is a campaign run by fishermen called “Forests are Lovers of the Sea”. In Japan, fishermen are replanting forests along some estuaries and coastline because the leaves dropped from the trees into the estuaries and sea leach acids which stimulate the growth of plankton. Plankton are the first and most important building block of the food chain in the ocean, they are like the grass of the sea and some whales eat this and other whales will eat the organisms which have grown on the plankton.

Fishermen aren’t planting trees for fun they are planting them because planting trees actually gives more fish - and more whales in the sea!

4) STRING ACTIVITY WIND-DOWN

The connections I have presented here are just the tip of the iceberg, there are thousands of connections most of which, I bet, we still know nothing about. We are discovering that plants feel pain, can communicate well, can learn from experience and remember so who knows what we will discover in the future. There’s even talk that they may have a form of a brain in their root tips.

We’re all entangled in this amazing web, but whatever organism we are and however we live we have the same goal – the continuity of our species. If you keep yourself alive and you keep your offspring alive – that’s success. But it’s only partial success, real success is keeping your offspring alive for thousands and thousands of generations. Trees have learnt the secret of success – to take care of the place that’s going to take care of their offspring

To my mind, trees have also learnt the answer to that big philosophical question that humans have written about and debated over for centuries and still can’t answer.

What is the point of life?

I think trees have been showing us the answer for centuries –

The point of life is to create conditions conducive to life.

5)PLAY WITH STRING WEB (5mins)

Throw in inflatable globe and play.

6) RELAX, CLOSE EYES and I READ POEM (10mins)

“Shoulders by” Shane Koyczan

Can be heard on web, with video, here <https://www.youtube.com/watch?v=An4a-NjilY>

*Like many, I love to look at the stars.
I love the fact that ours is just one among many.
What I love about astronomy is that our constellations tell a story.*

Our constellations were born from mythology.
 Mythology was our first attempt to understand the world in which we live
 We put a God in everything and those Gods would give us our reasons.
 Why is the sky blue?
 Who chose blue?
 Gods.
 How come men have nipples?
 It's the will of the Gods.
 Why does this wine taste so good?
 There's a God in it!
 And for a while, there was not a single thing that the gods could not explain.
 We believed that their anger gave us lightning;
 Their despair gave us rain
 We whispered our desires to them, believing that their charity would sustain us.
 Those Gods... were just stories.
 But stories became a large part of how we learn
 They burn lessons into our memories
 They become a part of how we remember; we can remember almost everything,
 Right down to that first unbearable bee sting
 When we learned that this tiny blue marble we call the world has rules.
 Rule number one: don't fuck with the bees!
 An unforgettable lesson brought to you by your memories.
 I remember that I grew up loving mythology.
 I remember the story of the titan Atlas, who was also the god of astronomy
 The original global positioning system sending sailors safely home by telling them which constellation to keep
 starboard.
 He taught us about the stars, and in all this, while he held up ours
 Our pale blue dot.

But Atlas is caught between two different tellings of his story.
 In the first, he leads a rebellion against Olympus and is then sentenced to hold the heavens on his shoulders for
 eternity.
 In the second story, he is chosen to be the guardian of the pillars that hold up the earth and sky.
 I prefer the second story.
 It means that the world is not a punishment; but rather, a responsibility.
 But how can just one be charged with such a burden?
 How can just one be responsible for all this?
 When I think of Atlas, I think of a single drop of rain
 I think how unfair it would be to hold a single drop solely responsible for making the entire world clean again.
 I remember how my grandmother tried to explain our world to me-
 She told me a story
 She said the ground and the sky, they love each other
 But they don't have arms
 So rain; that's just how they hold one another.
 I began to see how the earth and sky need each other.
 But I wondered about us.
 In this perfect design, where do we fit?
 Which piece of the puzzle are we?
 Like constellations, I began to see a connection between dots and numbered my thoughts
 And drew lines from one to the next.
 I began to see us in the context of a bigger picture, sharpening the blur slowly into focus
 We are Atlas.
 I saw that this pale blue dot, this one world, is all we get.
 There will be no reset button, no new operating system, no downloadable upgrade
 We will not be allowed to trade in our old world for a new one with climate control or better fuel efficiency
 We get one shot at this.
 Dismiss all reports of second chances; we get one.
 And yet we draw advances on our future as if we one day won't be held accountable-
 We will.
 We are.
 The human race runs toward a finish line emblazoned with the worlds 'too far' and wonders,

Will we ever cross it?
 Have we already?
 We are faced with the seemingly impossible talk.
 And it's okay to be afraid.
 Our dilemma stands before us like a mountain carved into a blockade, the sheer magnitude of our problem would
 be enough to dissuade anyone.
 How do we save the world?
 We lay in our beds curled into question marks, wondering
 What can we do?
 Where do we start?
 Is hope a glue crazy enough to hold us together while we're falling apart?
 The burden seems immense.
 But we can do this.

*We must take the martial arts approach to loving our planet-
Love as self-defense
Forget about the cost
There will be no other thing as worth saving as this!
Nothing more important; nothing as precious;
This is home.
All of our stories start and end here.
We are sheltered within an atmosphere that has given us every single breath we will ever take
Every monument we have ever made has come from the flesh of our planet.
Water like blood, skin like soil, bones like granite
It is not a myth, there is no debate, facts are in
Fact is, there's never been any question.
We are facing crisis.
We dismiss the truth not because we can't accept it, but because having to commit ourselves to change is a scary prospect for anybody.
The most alarming part of the statement 'we are facing crisis'
Isn't the word 'crisis',
It's the word 'we'.
Because those two letters take the responsibility away from one and rest it squarely on the shoulders of everybody.*

*We are Atlas now.
But our strength will come from finding a way to share in shouldering the responsibility of turning the impossible into somehow
Somehow, we will do this.
We can do this.
We can dismiss apathy; we can reject uncertainty
We can be the new chapter in our story
We will not see change immediately
We must act in faith as the hour hand grips the minute hand and they land on the eleventh hour
We must believe like the seed that change is possible to see.
It never sees the flower, it grows knowing it must become more than what it was
It changes, because in growth, all of its potential can be unlocked.
Change is like rain, it starts with a single drop.
Just one, like our pale blue dot.
Caught in an endless waltz called gravity, we circle the sun, wondering who, if anyone left the light on.
We are constellations drawn upon the earth, we are connected to one another, we are bound.
We must behave as the arms that connect the ground to the sky.
We must try to be more like the rain.
Our stories may differ, our goal is the same:
How do we save our pale blue dot?
We act as the rain, realizing that each individual drop is as equal and important as any.
We act as one.
For now, we are many.*

-
- 7) GO ON WOODLAND WALK**
8) ART WORK ALL AFTERNOON ACCOMPANIED WITH TEA AND BISCUITS
9) ASSESSMENT FORMS OUT

References for talk.

The Hidden Life of Trees, Peter Wohlleben. Greystone Books 2016

<https://asknature.org/resource/biomimicry-with-janine-benyus/#.WW2gqbpFxAg>

<http://www.ecology.com/2012/10/08/trees-communicate/>

http://www.env.go.jp/nature/satoyama/syuhourei/pdf/cje_13.pdf

Description of Drawing Connections Project

Drawing connections

..... on the edges.



Supported using public funding by
ARTS COUNCIL ENGLAND

Drawing Connections is an Arts Council-funded project, led by Rebecca Lindum Greene, that brings together residents from HMP Springhill and students from the local Banbury & Bicester College, Art Faculty to work creatively with each other through a series of six artist-led workshops, held within prison grounds.

Drawing Connections seeks to forge connections, through art, between two groups within the local community who might not otherwise meet, building confidence and networks of support for all participants, in ways that are particularly valuable to Springhill residents, as they embark on their reintegration into the community.

Drawing Connections will give participants opportunities to explore different artistic perspectives and develop and broaden their artistic skill set. By exploring the theme of connectedness and by learning alongside people from different backgrounds, participants will be encouraged to expand their own perceptions and awareness, building empathy, understanding and disassembling stereotypes and fixed mind-sets. The works produced throughout the project will be used to create collages and community art pieces for prison garden display, to encourage and inspire future visitors and bring colour to the family visits centre experience.

Artists involved in the project include:

Manuela Hübner, www.manuelahubner.com; Alexandra Buckle, <http://www.alexandrabuckle.co.uk>; Femi Martin, www.femimartin.com; and Horticultural Therapists and Practitioners, Charlotte Synge, www.verdantearth.co.uk and Lisa Pearson.

The project is led and convened by Rebecca Lindum Greene, www.lindumgreene.co.uk.



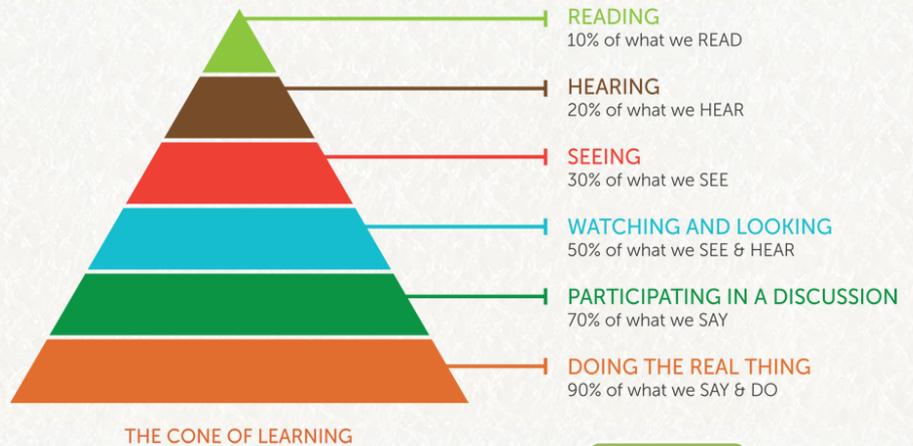
Some important teaching principles used during the design.

- 1) Maslow (1987) felt that obstacles that prevent someone from learning should be removed and he developed a “Hierarchy of Needs”. This “Hierarchy of Needs”, expressed in educational terms is a good guide for tutors trying to establish an environment which addresses the learners personal needs. Often Induction, Ice-breakers, Ground rules, Energisers, Breaks and Round-ups are used to help address some of these personal needs. Venues and layouts of rooms should also be considered.

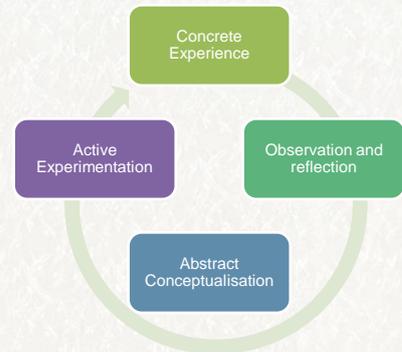


- 2) Fleming (2005) attested that people can be grouped into four learning styles **Visual, Aural, Read/write** and **Kinaesthetic** so it is important to include as many styles and activities as possible to allow for a group's varied learning preferences.

- 3) The Dale's (1969) **"Cone of Learning and Experience"** shows that, after two weeks, most people have remembered things better if they speak and do rather than just read. So it is important to plan in active learning experiences rather than purely passive.



- 4) Kolb (1984) proposed the **Experiential Learning Cycle**, he believed that the more often a person reflects on a task the better they learn so incorporating reflective tasks or time is useful. (Created from *"The Award in Education and Training"*. Ann Gravells, Sage Publications 2013).



- 5) Bloom (1956) identified six progressive levels of learning and what level is required to be taught influences what is presented, how to learners.



- 6) Assessment is an important part of the teaching process and it is used for various purposes. It may be initial, diagnostic, formative (usually informal and continual), summative or holistic (covering many aspects of a qualification). It must be appropriate, accountable, transparent, reliable, authentic, relevant and sufficient. It is usual to follow an **Assessment Cycle** and record results. It is good practice to incorporate assessments throughout a learning session. When choosing assessment methods it is important to offer variety to learners in the way they demonstrate their learning, and to help them to develop a well-rounded set of abilities. (Created from “*The Award in Education and Training*”. Ann Gravells, Sage Publications 2013).



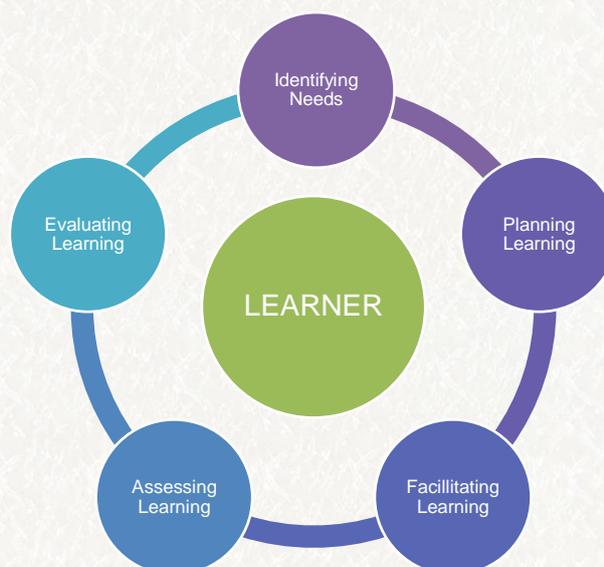
- 7) The **Teaching Learning and Assessment Cycle** is good for assessing what the learner has learnt and needs to learn. (Created from “*The Award in Education and Training*”. Ann Gravells, Sage Publications 2013).

- 8) Research shows that the attention span of most teenagers and adults is around 20 minutes so tasks should be broken down into spans of less than 20 minutes with something different in between. In children it can be far less.

- 9) People learn better and are more comfortable if they know what is coming, so an outline summary at the beginning of what will happen and is expected of them is important.

- 10) An outline of what was covered at the end of a learning session helps people remember.

- 11) In less formal situations it is often important that the learners can communicate with each other in a relaxed way and discuss matters. This needs to be incorporated into the plan, often between the more focused tasks and can be used as an energiser or break.



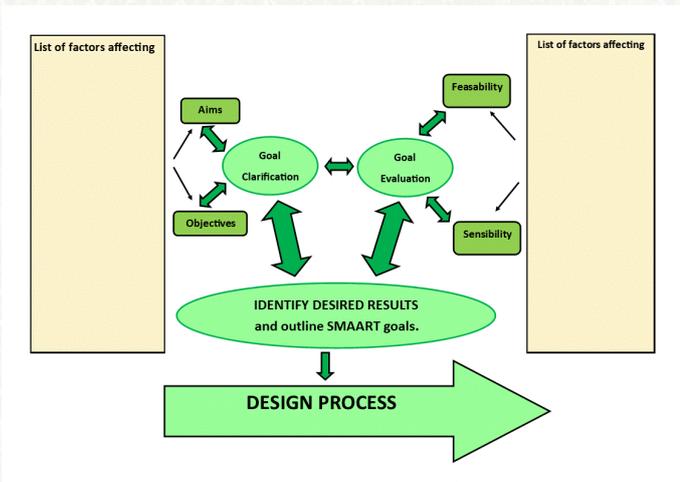
ASSESSMENT OF THIS DESIGN

Evaluation

I have created and gone through an intentional design process which I believe worked well for the workshop I have tried it on. I also used a variety of thinking and analyses tools which have helped me with the design and workshop assessment. I believe the workshop resulting from this project has been successful as I have been invited back to do it again several times. At a prisoners art exhibition I met one of the prisoners I had done the workshop with and he was so enthused he had started the Permaculture Design Course. this made my day. The fact that I felt comfortable adapting a design framework and using others highlighted to me how far I have progressed. On a scale of 1-10 I currently feel this project deserves a 7.

Table 2 Action Learning Cycle analysis of design

<p>Design</p>	<p>The designing of the approach took time because I had to get my thoughts really well organised. The use of the computer where I can rearrange and change things easily is a huge boost to my ability to organise things . Before I had hand drawn mind-maps that were so complicated with so many crossings out and moving of lines the page was hardly decipherable. The computer is a huge boost to such designs, I prefer it to hand drawing although having arranged everything on the computer it is nice to hand draw mind-maps for giving talks and where learners will see them as they are far more personal and memorable, especially when pictures and patterns are incorporated.</p> <p>I attached some basic teaching and permaculture principles to the design because I wanted the design to have enough basic teaching and permaculture principles for people who haven't done any teachers' training to be able to have a good go at teaching.</p>
<p>Implement</p>	<p>Following the design did make my life easier and I feel it made me better prepared. I found I was tweaking and adding to the design while implementing it to plan the workshop. As a result the implementation of the design was improving it before I even gave my first workshop. I'm sure more implementation will result in more tweaks. An evaluation of the workshop implemented with the use of the design can be seen here</p>
<p>Observe</p>	<p>The workshop used to implement the design was not ideal for testing the design as it was not a very serious learning session. Using the design made me feel more able and confident which was an unexpected bonus.</p>
<p>Reflect</p>	<p>In many situations, I can see that the effort put into defining aims, objectives and getting the desired results written down clearly and explicitly with priorities explained makes absolute sense.</p> <p>It is something I find really difficult to do.</p> <p>Another yield from this project may be that I can use a form of the design (on right) for identifying the desired result for other design projects.</p>



How this design meets the Ethics and Principles of Permaculture

People Care - If the design makes it easier to prepare learning sessions it will help the tutor. If it helps to prepare better learning sessions then it will help the learners as well.

Observe and interact -The design encourages more careful observation, reflection and interaction.

Catch and store energy - If the design makes planning a workshop more efficient the energy put in to the design has been stored for future use.

Obtain a yield - The design is a yield that I can use again and again

Design from Pattern to Detail - Going from pattern to details is how the design for an approach for preparing for a learning session works. i.e. moving from the desired results down to the objectives to achieve and then down to the detail of what will be presented and finally to the how and when.

Creatively use and respond to change - For me this design is a way of helping me to creatively respond to the inevitable changes that come with aging; as I do less physical work and try to become more efficient and better at imparting knowledge. Change, although it can be a bit frightening, can bring about positive events and sometimes chain reactions that open doors onto yet more positive events - providing we use it in a creative way.

Assessment of Individual Design for Feedback Table

DIPLOMA in APPLIED PERMACULTURE DESIGN System 5.2 ASSESSMENT of INDIVIDUAL DESIGN for FEEDBACK

Effective from Oct 1st 2013

Diploma Apprentice's name:	Charlotte Synge
Date first registered for Diploma:	26th January 2015
Date of this feedback:	
Name of Personal Tutor:	
Name of Assessment Tutor:	Aranya Austin
Project Title:	Design of approach to aid the planning, preparation and running of a learning session

Date Started:	August 2017
Date Completed:	December 2017
Implemented:	Yes
Design Number	7 of 10

**ACCREDITATION CRITERION: 1. Demonstrating design skills
(Section C3 in the Guide to Accreditation Criteria)**

	What's gone well?	What could have been done differently?
Accurate and appropriate use of an intentional design process.	Yes The CEAAPPIET design process has worked reasonably well. The addition of clarifying a well-defined goal prior to CEAAPPIET is an important part of the design process	I'm not sure here. I had hoped to try using a web design approach in order to try it out but found I couldn't work out how to make it fit this situation.
Use of permaculture ethics, principles and theory is appropriate to the situation.	Yes. The following principles are used - Observe and interact, Catch and store energy, Obtain a yield, Design from pattern to detail. Creatively use and respond to change. More details on how these relate to this design can be seen here	
Use of a variety of tools which suit the needs of the client and the situation.	Yes. The thinking, design and evaluation tools used are appropriate.	It would be good to have others try out the design. Both teachers and those not trained.
Design is intelligible, coherent and effective (i.e. it met the needs of the client).	Yes, especially as I am the client. I have made it thorough enough, I hope, for those without teachers' training to be able to design and implement a good learning session by using the	Not sure.

	design and attached information.	
Documentation for and presentation of the design is appropriate for clients & third parties.	Yes. I believe the design presentation is clear. I think it is thorough enough to keep people on track but they might have to look around for more details on teaching practices for some situations. The way that the design is presented, with additional teaching principles included, allows for the project as a whole to be used as an outline teaching resource by myself in the future and others.	A more artistic presentation might be better. A more thorough flow chart might be appropriate if the design were to go deeper into teaching theory and practice.

ACCREDITATION CRITERION: 2b. Applying permaculture to your work and projects

(Section C2 in the Guide to Accreditation Criteria)

	What's gone well?	What could have been done differently?
Identify which of the 15 categories of application the design applies to from the checklist in the Guide to Accreditation Criteria, and provide feedback on each.	<p>Community Development This design is to aid preparation and planning for learning experiences. It can therefore be used in many ways, including community development. In this case the design was used to promote connections between prisoners, soon to be released, and the outside world in the forms of art students and nature - particularly trees.</p> <p>Art, media, Culture and Communications The design is about enabling good communication and learning processes. In this example the design was linked to the use of art as a form of communication.</p> <p>Education</p>	

	<p>This design centres on ways to provide good learning sessions.</p> <p>Personal Development and Inner Transition.</p> <p>I hope this design will help me to become a better teacher and enabler.</p>	
<p>Clear explanation of how the solution was developed using design process and Permaculture theory.</p> <p>The solutions are relevant and appropriate to the activity and content areas.</p>	<p>The development of the design process CEAAPPIET was relevant to the activity and the evaluation of it using the Action Learning Cycle here is appropriate</p> <p>The design aims to have more than one yield as it can be used for any teaching preparation but the goal identification part of the design should be relevant to other design situations not related to teaching.</p>	

ACCREDITATION CRITERION: 3. Learning from and developing your permaculture practice

(Section C5 in the Guide to Accreditation Criteria)

	What's gone well?	What could have been done differently?
Evaluation of the effectiveness of your design work on this project.	The design works well for me. My evaluation of it using the Action Learning Cycle can be seen here .	Not sure
Reflection on use of design tools and processes, and use of Permaculture theory and practice.	<p>Many design tools and processes are used as this design is about the use of design tools to plan.</p> <p>SMAART thinking tools, "Backward Design" and CEAAPPIET design frameworks and, Action Learning Cycle, Feedback forms, Discussion and 4P's (Process, Product, Personal, Peers) evaluation are all used in this project.</p>	Other design tools and processes could have been used to equal effect.

How the design shows that your competence and skills in practice and learning is progressing.	<p>The design research led me to look at backward design which is new to me and very much in keeping with permaculture design. I think it will improve my permaculture designing capabilities in future.</p> <p>In general the designed approach to planning a learning session highlights my permaculture outlook and shows that I can use it in areas other than land projects which, I find, are easier to relate to permaculture principles, processes and approach strategies.</p>	Not sure

Comments about project format, general or specific issues

Any other comments?	
---------------------	--

Conclusions

How ready is this design for presentation?	
What are the apprentice's next steps?	
The highlight of this design for me was....	
