



Communication and Dissemination Series 3

Communication Manual

Practical Considerations for Planning and Implementing
Communication Activities.

Part 2. Guidelines for developing communications materials for natural resources
projects

By
Florence Imaikorit-Oumo, A. Mulhall, D. Rees and L. Oruko
NARO/DFID, COARD Project

December 2002

Acknowledgements

These guidelines are developed from a draft started by Ms A Mulhall, adapted from: Norrish, P., Lloyd Morgan, K. and Myers, M. 2001. Improved communication strategies for renewable natural resource research outputs. *Socio-economic Methodologies for Natural Resources Research. Best Practice Guidelines*. Chatham, UK. Natural Resources Institute.

We would like to acknowledge Dr Pat Norrish for providing most of the material in these guidelines and for giving valuable comments on the layout and content of the guidelines.

Table of contents

1	Introduction	5
2	The use of different communications media	5
2.1	Face To Face Events	5
2.2	Folk And Live Media	6
2.3	Printed Materials	7
2.3.1	Types of printed materials	8
2.3.2	Printed materials: 'How to manuals'	8
2.3.3	Printed materials: Newsletters	9
2.3.4	Printer materials: Posters	9
2.4	Radio	10
2.5	On-Line Delivery Systems	11
2.6	Video	12
	TOOL 1: Using a media professional	14
	TOOL 2: key issues when conducting a needs assessment	14
	TOOL 3: Assessing the communication context	15
	TOOL 4: Pre-testing media	16
	TOOL 5: monitoring and evaluating communications activities and products	18
	References	19
	Glossary	22

1 Introduction

These guidelines are produced to assist the development of communication materials that disseminate complex scientific messages in simple forms and/or contents which can be easily understood by farmers and other non-specialist end-users.

These guidelines are a simplified form of a more detailed set of guidelines on planning a communications strategy for RNR research see Norrish, P., Lloyd Morgan, K. and Myers, M. 2001. Improved communication strategies for renewable natural resource research outputs. *Socio-economic Methodologies for Natural Resources Research. Best Practice Guidelines*. Chatham, UK. Natural Resources Institute.

2 The use of different communications media

This section provides some guidance on the types of media useful for communicating the results of natural resources research projects. For each media type there is:

1. A checklist to guide you on how to use the media and some criteria to follow
2. Advantages and disadvantages to the media type to guide you on when and where the media type is best used.

At the end of this section is a list of useful references and websites for more detailed information.

2.1 Face To Face Events

Generally speaking, there is nothing to beat face-to-face events, which include workshops, training, farmer field days and participatory rural appraisals (PRAs). Good meetings, particularly in the case of workshops, where some sort of commonly agreed output is intended, need skilled facilitation.

Checklist for workshops, training and PRAs

1. The aims and the expected output are clear
2. an appropriate language is used
3. All participants are treated as equal partners
4. Skilled and neutral facilitators are used
5. The timetable is not overloaded with formal presentations
6. Proceedings are made available to all participants and other potential users
7. Contact numbers and addresses are recorded and circulated
8. Participants are not too diverse
9. There is plenty of time for discussion and for making contacts
10. You provide conducive surroundings and appropriate refreshments
11. Consider good handouts/support materials
12. You record numbers and types of people attending for reporting purposes

Advantages

- ☐ Workshops can elicit genuine participation by intermediate and end users
- ☐ Immediate feedback on an idea can be obtained
- ☐ They can establish good working relations
- ☐ They are good for professional networking
- ☐ They are good for disseminating/demonstrating a tangible technique or technology
- ☐ They can be quoted as a project output

Disadvantages

- ☐ Workshops can be expensive particularly if airfares are involved
- ☐ They are difficult to evaluate
- ☐ Participatory workshops may be intimidating to novices
- ☐ Workshops can sometimes be seen as just lip service to donor requirements.

2.2 Folk And Live Media

Folk/live media includes drama, forum theatre, role play, music, puppets, mime, dance and story-telling. It is a form of communication that has existed in many cultures for years and before the arrival of mass media. This form of media has many uses from conveying a message, enabling people to explore and analyse their own situations.

Checklist when considering using live drama/song/puppets etc

1. Who is your target audience?
2. What type of folk media are they used to, if any?
3. Have you got access to local theatre/dance/puppetry practitioners, facilitators (folk media, by definition, cannot be done by outsiders)?

Advantages

- ☐ Live drama, dance, and music draws a crowd
- ☐ It can elicit a high degree of community awareness
- ☐ It can reach large numbers of people (at community level)
- ☐ It can have greater credibility than mass media
- ☐ It is often relatively cheap
- ☐ It can be very memorable
- ☐ It can create much local goodwill
- ☐ It is particularly good for involving children and youth
- ☐ It is good for communicating non-technical messages (e.g. behaviour change)
- ☐ It is an option if audience is non-literate
- ☐ It can be good for exploring politically or culturally sensitive topics
- ☐ Role plays or skits can be used as an icebreaker at workshops
- ☐ It can serve as a tool for diagnosing communities' problems

Disadvantages

- ☐ It can be seen as too childish - particularly puppets
- ☐ It can easily become top-down and paternalistic
- ☐ It is difficult/impossible to adapt beyond immediate context
- ☐ It is rarely suitable for imparting skills/techniques/technical information
- ☐ It is difficult to evaluate
- ☐ The entertainment may distract from the message
- ☐ Participatory drama is difficult to document by conventional means
- ☐ It can cause offence if used insensitively
- ☐ It may be tricky to justify to donors
- ☐ It can sometimes be chaotic

2.3 Printed Materials

Print is a versatile medium and covers a wide range of products (handbooks, booklets, leaflets, newsletters, posters, etc.). Print materials can be used in a number of different ways. They can be used in their own right, or as support for other kinds of media in campaigns and in training situations. They can be something with a short life, to be read and thrown away, or they can be a permanent record to be used and re-used. They can be designed for individual use (a pocket book) or for use with groups (teaching charts) or crowds (posters).

General checklist for print materials

- Who is your target audience?
- What printed matter are they used to?
- What sort of look will they expect? (e.g. glossy/commercial/basic photocopy/newspaper style/academic style etc.?)
- How literate are they in relation to text, photos, cartoons, pictures, diagrams, graphs, maps?
- Do you have time and money to research the above?
- Can you employ local writers/illustrators if necessary?
- In what context do you expect your printed matter to be used e.g. field, classroom, at home, at conferences etc.?
- Can you develop the materials WITH your audience, testing, acceptability of format, graphics and text at every stage?
- Have you considered printing costs (normally cheaper in developing countries)?
- Will users be able to get copies of/duplicate your product easily and cheaply?

Advantages

- ☐ There is a wide variety of different production processes, allowing the choice of the most appropriate for any given situation and other advantages:
- ☐ A wide range of possible formats (hand-outs, workbooks, posters etc.)
- ☐ The use of different materials (paper, cloth, plastic etc.)
- ☐ Printed material can be produced to any level of sophistication and finish and suited to any audience.
- ☐ No special rooms or facilities are needed to use printed materials.
- ☐ People can use printed materials in their own homes, read at their own pace, and re-read as often as they want.

Disadvantages

- ☐ Printed materials may be fragile and susceptible to wear and tear
- ☐ They can be difficult to store as it may come in all shapes and sizes
- ☐ Distribution may be difficult
- ☐ Long term storage may be difficult due to bulk and susceptibility to heat, damp, etc.
- ☐ With largely non-literate audiences special care must be taken to create usable material.
- ☐ Printed materials can be viewed as impersonal and thus easily ignored.

2.3.1 Types of printed materials

Print is the most commonly used medium for dissemination and so there are many types of printed materials. The table below gives some definitions on the main forms of print medium; however, many terms are often used interchangeably. Manuals, newsletters produced within a project and posters are described in more detail later in this section.

Printed material	Description
Flyer	Usually a single, one-sided sheet of paper containing a simple message. For example, you may produce a flyer to raise awareness about a new seed variety to hand out at a market day
Leaflet	A leaflet is similar to a flyer, but may be a little longer (2 sides rather than one). People often produce leaflets to provide general information about a project
Brochure or Booklet	A brochure or booklet is a longer version of a leaflet, but much shorter than a book. It contains more detail than a leaflet. For example, you may produce a brochure or a booklet about characteristics of different varieties of groundnut.
Newsletter	Can be any size, shape and form and can contain text and pictures. Usually to inform people about events, key findings, updates on what is happening in the project
Handbook or Manual	Manuals are usually instruction books on 'how to do' something. They may contain step-by-step instructions for carrying out an activity. For example you may produce a manual on how to adjust a weeder.
Poster	A single page containing a few words and usually a graphic. They transmit a short, single message (e.g. 'vaccinate your chickens')

2.3.2 Printed materials: 'How to manuals'

A manual is normally a printed book that contains instructions (in text and/or with pictures) on how to do something.

Advantages

- ☐ Manuals and booklets can be continually referred to (unlike one-offs like a video or a classroom lesson)
- ☐ They have a long shelf-life
- ☐ They can obviate the need for training courses
- ☐ They can be highly treasured by recipients
- ☐ They can reach non-literate audiences with good visuals

Disadvantages

- ☐ A manual or booklet will always be second-best to seeing/doing/working with the real thing
- ☐ Manuals and booklets can be tricky to target appropriately
- ☐ They can be expensive to produce
- ☐ Their production can eat up a lot of staff time
- ☐ Training in their use may be needed

2.3.3 Printed materials: Newsletters

Newsletters can be hand produced, typed, or a mixture of both. Most projects will probably have their newsletters designed and produced using basic word processing software, or a DTP system, and a photocopier.

Checklist for producing own newsletter:

- Do you have someone trained in the use of DTP software?
- Do you have someone trained in basic design skills?
- Is there support for software and hardware?
- Do you have a reproduction system available?
- Do you have a budget for staff-time to maintain mailing list and for postage?

The disadvantages of only disseminating via international journals are well documented. Local in-country journals or local newsletters may be a better way to reach intermediate users. However, there are both advantages and disadvantages to publishing your own project or network newsletter.

Advantages

- ☐ Newsletters are good for reaching intermediate users such as extension agents
- ☐ They can foster lively debate and exchange
- ☐ They can foster goodwill towards the project
- ☐ Simple formats are cheap to produce
- ☐ They can encourage cohesion between co-workers
- ☐ They provide an incentive for scientists to write-up project experience quickly
- ☐ They help attract and retain membership of a network
- ☐ They can attract a wide range of readers
- ☐ They are easy to photocopy and pass around
- ☐ They can be easily adapted for internet publication, thus reaching more readers

Disadvantages

- ☐ Specialist newsletters may reach only a small audience
- ☐ They may be too sophisticated for end-users (e.g. non-literates)
- ☐ They may be regarded as insufficiently rigorous by some scientists
- ☐ They can fall into the trap of targeting too many different groups

2.3.4 Printer materials: Posters

Posters should be large enough to attract attention and be seen and read from a distance. They should be based on a single idea expressed in a brief slogan (some recommend a maximum of 7 words) and clear, culturally appropriate images - meaning should be self evident. They can best be used for creating awareness or promoting action (they may persuade, warn, forbid etc.) as part of a campaign advertising an event or product.

Advantages of posters

- Posters are good for giving simple, straightforward information
- They are good for reminding people of what has been taught

Disadvantages of posters

- They are not suitable on their own for teaching or explaining
- they do not have lasting impact, once people have got used to seeing a poster they stop noticing its contents.

2.4 Radio

The reduced cost of buying and maintaining a radio and the increasing number of local and community radio stations means that it is now the most widespread of the mass media. Radio can be used for a variety of purposes to:

- Raise general awareness/entertain/inform
- Teach/train/encourage behaviour change
- Generate a discussion about a particular development issue
- Warn or mobilise quickly
- Persuade and encourage consumer uptake: radio can broadcast 'social marketing' advertisements
- Foster community development

Checklist for radio

Does a large proportion of your intended audience have access to and listen to radio/TV? (World Health Organisation recommends at least 30-40% of target audience).

Do they trust/like the channel you propose to use?

Are you confident of reaching your desired audience? (i.e. can you control or specify schedules; language or dialect; appropriate formats to attract and maximise listener numbers)?

Do you have time and money to pre-test your programmes on a (small) sample of your listeners?

Can you afford to buy air-time? (very few stations will give it free)

If not, can you attract commercial sponsorship?

If considering radio does your information/message lend itself to an ephemeral, non-visual medium?

Can you fulfil the entertainment expectations of your radio audience?

Can your information/message be simplified for a non-specialist audience?

Can you combine broadcast media with other media such as posters, newsletters, or text-books to maximise impact?

Do you have (access to) staff who are creative enough to translate your information into simple, memorable, imaginative and engaging programmes?

Are you confident that you can respond to the new demands/queries generated by your radio programmes?

Have you got time and money to monitor and evaluate your radio programmes?

Radio – advantages and disadvantages

Advantages

- Radio reaches a very large audience
- It can convey news or messages very quickly
- It can be particularly effective in rural areas and non-literate cultures
- It can also be effective for influencing decision-makers and local government
- It is a relatively simple and ubiquitous technology
- Radio programmes are relatively cheap to produce and cost-effective to broadcast
- Radio stations - of a community kind - are relatively cheap to set up
- Radio can attract a very loyal audience
- It can be listened to almost anywhere
- It encourages social gatherings and can promote discussion
- It can be interactive
- It stimulates the imagination
- It carries authority
- It is portable
- It does not require mains electricity

Disadvantages

- Radio is ephemeral
- It is less memorable than visual media such as TV
- It can become background noise
- It is not suitable for imparting technical skills
- It normally requires human backup
- It requires electricity/batteries (in most cases)
- Bad reception can put listeners off
- It requires skilled and experienced broadcasters/script-writers/producers
- It requires constant financial input
- It can be difficult to maintain editorial control
- It tends to reach more male listeners than women and children
- Radio may not always be trusted

2.5 On-Line Delivery Systems

This section cover three relatively distinct uses of the Internet: conferencing and newsgroups; publicity and promotion; and use of the World Wide Web (WWW).

Conferencing and news groups (attending a virtual meeting)

Advantages

- Internet conferences are cheaper to attend than live conferences
- less time-consuming than travelling overseas
- More publicly accessible
- Can allow researchers to trial ideas
- Can promote distance education

Disadvantages

- On-line conferences may not be quality controlled
- No substitute for face-to-face contact (and less fun)
- Perceived as time-consuming
- Requires all participants to have up-to-date software
- May be more popular among students than real professionals

Checklist for on-line delivery systems

Do most of your regular/potential correspondents have fast and inexpensive internet access to e-mail?

Have you/your organisation got the capacity to respond to the potential increase in correspondence/interest?

Do most of your regular/potential correspondents have fast and inexpensive internet access to the WWW?

Are there several well known names and sites that you could make a link from from DFID's website, your University or Research Institute?

Has your speculums got an obvious and unambiguous name which will enable access through a search engine?

Have you got in-house technical expertise to maintain the web-site?

Can you afford to buy-in expertise?

The World Wide Net

Telecommunications systems are expanding very quickly in Uganda and access to the web is now available through a number of service providers (e.g. infocom, africaonline, utl) and through a number of telephone networks (e.g. Uganda telecoms, mtn, celltel). Establishing a website is still costly, but NARO is in the processes of developing its own website and this is an excellent opportunity for reaching a wider audience.

Advantages

- Websites are effective in reaching a public/policy audience (e.g. developed country audiences)
- They can be cost-effective in terms of numbers reached
- Can help establish dialogue by providing contact e-mails and addresses
- They can encourage professional networking
- They can expand the reach of published newsletters

Disadvantages

- Websites are inaccessible to most end-users of natural resources research
- You do not know exactly who you are reaching
- Updating and technical maintenance can be expensive
- Frilly websites are off-putting and slow to download
- There is a fear of unwanted or offensive correspondence (although most fears are unfounded)

2.6 Video

Video technology can be used for four basic purposes in development work. It can be used to make standard documentary or promotional features, produced in a development context and also for playback of pre-recorded tapes as part of an educational, training or development process. It can be used to gather information, to make and store records, and to monitor and evaluate activities, and finally as a participatory tool for group development in which video is used to bring people together, stimulate discussion and expression and develop communication within and between groups. (Shaw and Robinson (1997))

Checklist for video

If you cannot have local access to equipment can you afford the relatively high initial investment? Have you got access to scripting, camera and editing skills?

Are you sure your intended audiences will not be more than 50 per showing?

Is your chosen film format compatible with your target country's system?

Can you supplement your video with human back-up to answer questions/guide discussion?

Advantages

- Ease of operation: only a few weeks is necessary for anyone to learn to manipulate editing equipment and just a few hours to use a camera
- Video can help overcome literacy barriers
- Anything recorded can be played back immediately without the need for processing
- Can compress time (e.g. yearly life cycle of plants can be shown in a few minutes)
- Can bring other realities (showing how something has been done in another community)
- Video equipment is relatively easily transportable
- Tapes are easily copied
- Cameras can be run on batteries so electricity is not a problem
- Good for promoting discussion
- Good for recording

Disadvantages

- Spare parts and skills to maintain equipment may not be readily available.
- A stable electricity supply is necessary for showing videos
- Although it is easy to learn to use modern video equipment high levels of skills will be needed to make videos which are usable beyond the immediate group, particularly if they are to be used for training, reporting or promotion.
- Although the costs of equipment are coming down all the time video is still expensive when compared to folk media for example.
- Many communities don't have playback facilities and the advantages of immediacy and being able to see things many times are lost
- Skilled facilitators may be needed if good discussion is to come from video viewing.
- Too easy to record everything resulting in 'dead' tapes that no one looks at or the need for very extensive and therefore expensive editing.

Video expertise and equipment can usually be bought in locally, but some projects might want to provide equipment to collaborators or intermediaries as part of capacity building, or have video as part of their project communication equipment. However, skills are needed in correct use of the equipment and techniques. If money is going to be invested in making a video then it is worth hiring in a professional.

Digital system

Digital technology now allows video to remain in a format which is more flexible and does not degrade. Digital cameras are light-weight and will give a better quality picture than ordinary camcorders. The editing process - once learned - is much quicker. However, costs are higher and repairing and maintaining the equipment in developing countries is a problem.

TOOL 1: Using a media professional

The following checklist outlines will help keep control of the issues we wish to communicate, whilst getting the most out of the media professionals who have been commissioned and should facilitate working as a team:

- Make sure you know who your target audience is and what you hope they will learn, think or do, as a result of your communication product (if you do not know this, the media professional definitely won't).
- Give the media professional a short written brief (one side of A4 at most) outlining the above, keeping it simple and avoiding scientific jargon.
- Try to anticipate the questions he/she will ask (e.g. budget, timescale, quality of materials to be used (weight of paper; number of print colours; quality of videotape etc.).
- Establish a written contract
- Invite him/her to meet relevant staff and visit the field/laboratory/factory where the research is taking place
- Keep in regular touch with media professional and target audience as the product develops and insist on reviewing the draft product during its development
- Work with him/her on pre-testing the product on a small sub-section of the target audience
- Consult and work with her/him on distribution
- Work with him/her on monitoring and assessing impact.

TOOL 2: key issues when conducting a needs assessment

Broadly speaking, questions relate to the target audiences' knowledge relating to a given topic, their attitude to and interest in it, as well as their behaviour. Without this information, it will be difficult to identify which are the appropriate messages to develop and to deliver.

What does the audience already know about the topic?

Where do they find out about this topic?

What is their current attitude to this topic?

What is their current practice relating to this topic?

What are the constraints they face with regard to this topic?

Who is responsible for this topic, within and beyond the audience's immediate community?

When is the most pressing need for information/action/advice regarding this topic?

In summary, therefore, why conduct a needs assessment?

It will reveal the gaps in the target audiences' knowledge

It will reveal the extent to which an audience knows about an issue, but is not acting on that knowledge. It can provide baseline information, with which to assess effectiveness of intervention (and communication of intervention) at a later stage.

If conducted in a participatory way, it will engage the target audience and increase the likelihood of effectiveness of communication.

It can reveal reasons why a group may not act on information they already know (eg: taboos, cultural issues...)

TOOL 3: Assessing the communication context

The following need to be addressed in relation to different sub-sections (e.g.: women, men, young, old) within target audiences who may have differing access to information sources:

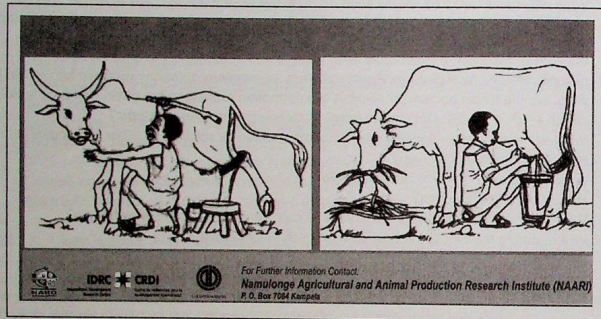
- Which means of communication do people and organisations prefer?
- What are national/local figures relating to reach and coverage of different media?
- What is the target audiences' ownership of, or access to mass media (eg: radio, newspapers, tv...)? This will be affected by literacy levels and language preferences according to gender, age, wealth, urban/rural, livelihood systems.
- What other sources of communication do people have access to? For example, friends, neighbours, market places, schools, religious bodies, folk media (e.g.: story-telling, poetry, drama), training centres.
- Which members of the community have respect and authority in the community (chiefs, religious leaders, politicians extension workers, commercial company representatives etc.)?
- What are the target audiences' sources of information relating to the given research topic?
- Which other institutions inform the target audience on the research topic?
- What are the target audience's sources of information for similar (ie: other NR) topics?
- How is this information given?
- Is this means of communication effective?
- How might it be improved?
- When is the best time of year/month/day to communicate re. the research topic?
- When, during the day, is the best time to reach target audience?

TOOL 4: Pre-testing media

The following checklists are for guidance only. You will need to adapt them according to the context of your project and the media you are testing. Generally pre-testing written text should be done separately from a picture as the following example shows:

Example: why should you pre-test text and pictures?

The poster below was produced to tell farmers one message. What do you think the message should be? The answer is on the next page.



Pre-test questionnaire – print

What does the picture show (point to different parts of the picture if necessary)?

What does the picture mean? Does it tell you something? What does it tell you?

What do you dislike about the picture?

Is there anything in the picture that is unclear? what is unclear?

What would you change in the picture to (a) make it more easily understood? (b) for it to be acceptable?

Is there anything missing from the picture? If yes, what? (adapted from Harford & Baird, 1997)

In producing a picture you need to consider

Should an illustration be hand-drawn or photographed?

Is it necessary to show the whole or parts of objects?

Is the picture culturally appropriate?

Is it in proportion?

Do you need to use symbols combined with illustrations e.g. symbols for wind direction or movement, crosses and ticks for good and bad (though this is not universal). You may need to have different forms/types of illustration and symbols for different groups.

In producing text, you need to consider:

Should you use the language of wider communication/national language or a local language? Should you use scientific words or the local word?

Suggested format for recording pre-tests for print and pictures

PRE-TESTING FORM:						Place:			Date:	
Personal information						PICTURE			TEXT	
Age	Sex	Single or married	Years of school	Income group	clan	What do you see?	What do you dislike?	What would you change or add?	What do the words mean to you?	What would you change or add?

(source: Harford, N., N. Baird. 1997. How to Make and Use Visual Aids. London: VSO.

pre-test questionnaire theatre

What is the story of this play?

Is this story real? Does this happen in your village? Your family? How?

Who are the main characters?

Do you know any people like that in your family? Your village?

Do you like the play? Why? Why not?

If not: What is it exactly that you dislike? Why?

Do you feel like discussing more in depth the issues the play talks about? If yes, with whom?

Pre-test questionnaire for songs

What is the song about?

What is the song all about?

What do you think about the words?

Is what is mentioned in the song happening: in this area? - in your household? - in your family?

What do you think of the music?

Do you like the song? Why? Why not?

If not: What is it exactly that you dislike? Why?

(source: FAO. Artists as Experts.)

Do You Want to Get More Milk ?

Be Kind to Your Cow

For a non-literate farmer, the answer may have been that you must beat your cow to get milk and to make it stand for milking. The real message of the poster is given below. A very different message than some people believed.

TOOL 5: monitoring and evaluating communications activities and products

The monitoring of communication activities should take place within the overall project monitoring system. It is not a separate activity. What you must ensure is that you identify all the communication activities and ensure that you have a monitoring indicator for each of them, and that you follow-up on the activity.

For communications activities you need to monitor the products (e.g. how many leaflets you produced, how many farmer group discussions you held, etc) and the activities (e.g. what happened in the workshops, what happened during pre-testing, how does information exchange take place?)

Getting feedback from your clients should form a major part of the monitoring process to improve future communication activities such as workshops, training, leaflets, radio programmes. You can carry out monitoring through a wide variety of methods such as focus group discussions, questionnaires, listening/viewing panels, diaries, audience ratings, interviews, regular consultation with stakeholders, the more ways you can use to research this the better.

You should be monitoring the activities so that you learn about what is working and what is not, why it is working and why it is not. This will enable you to continuously modify and adapt your approach and method as your project progresses (action learning). The kinds of questions that need to be asked are:

- How useful was a workshop/training to participants?
- What action came out from the workshop/training?
- How useful is the field day to farmers?
- What information did farmers gain from the field day?
- What would people like to see at a field day?

You could devise a very simple planning table to keep track of communications activities and products

Table 1: Monitoring framework to assess dissemination activities

Activity	Message (reason for dissemination)	Purpose of message	Target audience	Volume /location	Pre-testing and modification (dissemination)	Pathway (channel for)	Outcome (evidence of use?)
poster	Vaccinate cattle	Tell farmers when to vaccinate	Beef & dairy small holders	200	With 5 groups of farmers separated by men, women, youth	NGO programmes on re-stocking; cattle markets	Assess increase in numbers being vaccinated at correct time
workshop	To introduce farmers and community leaders to the research project	Awareness raising for participants inside and outside the project	community members in village X	About 3 groups of 10-15 members	Not necessary	Village head informs community members by word of mouth	Everyone attended the meeting. Ended with a quick review to see if all issues had been covered.

18

References

Other sources of information (from Norrish et al, 2001)

- Boeren A., 1994 In other words: the cultural dimension of communication for development. CESO Paperback No 19, The Hague: Centre for the study of Education in Developing Countries
- Braden, S With T. Huang, 1998 Video for Development A Casebook from Vietnam, OXFAM (Oxford) ISBN 0-855-983701
- Burke, A., 1999 Communications and Development: A Practical Guide DFID, London
- Christophers, A. 1998 Renewable Natural Resources, Research Output Dissemination Why and How (booklet), NRI
- Christophers, A., 1999 References: Guidelines on the citation of outputs from DFID funded projects managed by NRI International (booklet), NRI.
- ESRC (Economic and Social Research Council) 1993, Pressing Home Your Findings: Media Guidelines for ESRC Researchers Available from ESRC, Polaris House, North Star Ave. Swindon, SN2 1UJ
- FAO, 1989 Guidelines on Communication for Rural Development ñ A brief for development planners and project formulators, FAO, Rome (15pp)
- Fraser, C. and Restrepo-Estrada, S., 1998, Communicating for Development ñ Human Change for Survival Taurus Publishers, London
- Millerson, G. 1992 Video Production Handbook Focal Press, ISBN 0240513215; 245 pp.
- PLA Notes no. 29 Performance and Participation, IIED, London June 1997 (also includes good articles on participatory video and facilitation skills)
- Rural Extension Bulletin, June 1998: Theme issue on media communication and development. Reading University AERDD. (Includes useful articles on video, radio and participatory media)
- Saywell, D. and Cotton, A., 1999 Spreading the Word: Practical Guidelines for Research Dissemination Strategies, WEDEC Loughborough University
- Shaw, J And C. Robinson, (1997) Participatory Video: A Practical Guide to Using Video Creatively in Group Development Work, Routledge (London and NY) ISBN 0-415-14105
- UNDP Human Development Report, published annually by Oxford University Press gives a statistical communication profile for every country in the world, showing, for example, how many radios are owned per 1,000 people.
- Wilkinson J., 1985, A guide to basic print production, The British Council and Intermediate Technology Publications
- Zeitlyn, J., 1992, Appropriate Media for Training and Development Tool Publications, Leiden Netherlands. Available from Intermediate Technology bookshop
- Zijp W., 1994 Improving the transfer and use of agricultural information: a guide to information technology, World Bank Discussion Paper 247

Web sites on communications (from Norrish, et al. 2001)

The Communication Initiative website (www.comminit.com) has figures and statistics on media usage in 69 developing countries.

Macro International Inc. (USA) publish Demographic Health Surveys on most developing countries in which they usually give details of the populations' main information sources (e.g. newspapers, TV or radio etc.). Statistics can be accessed on the web (<http://www.macrint.com/dhs>) or reports can be ordered from: Macro International Inc. Attn. Publications, 11785 Beltsville Drive, Suite 300, Calverton, MD 20705-3119 USA. Fax: 301-572-0999 Tel: 301-572-0958

19

Johns Hopkins University: www.jhuccp.org/

This site enables one to access the JHU Centre for Communication Programs, and even reach their library of extensive and authoritative reports on their communications projects around the world. A very good resource.

UNESCO: www.unesco.org/

This eventually enables one to get access to the UNESCO library/resource centre through several further links. This is better for historical stuff on radio/communications than for up-to-date materials and it takes some searching - so a little frustrating.

IDS library search facility: <http://nt1.ids.ac.uk/databases/blsdb0.htm>

This is the Institute of Development Studies in Sussex, UK which holds a good range of books, articles and reports on development communications. Abstracts - but normally not the whole article - are available on-line and it's easy to search. A good resource for more academic stuff.

Population Council: www.popcouncil.org/

This allows access to its journal Studies in Family Planning where abstracts can be read of articles - though no complete articles are available on-line without paying a subscription to the journal. One or two interesting references to studies on media use for promoting family planning.

Journal of Health Communication: www.emerson.edu/JHealthCom/

Another academic journal with some references to articles about mass-media communications - though not much on radio when I had a look.

Development Communication Archive: www.utexas.edu/coc/rtf/facilities/devcom.html

This was formerly the Clearing House for Development Communication - now housed at the University of Texas, USA. Unfortunately its database is not yet searchable on-line, so I was unable to ascertain how useful it really is. However, it looks potentially very interesting.

FAO Communication for Development Homepage:

www.fao.org/WAICENT/FAOINFO/SUSTDEV/CDdirect/CDhomepg.htm

Another long web address, but worth searching through for good sources, contacts and news on development communications - as the Food and Agriculture Organisation see it. They are the main funders of rural radio in West Africa.

Annenberg School of Communications (Univ. of Pennsylvania): www.asc.upenn.edu/general/index.html
This site allows access to the Annenberg Schools library which has a wealth of information about communications in general. A good academic source.

www.id21.org

Development Research. Economic and social research digests on topical development policy issues. A good example of using the web itself for dissemination.

www.comminit.com

The Communications Initiative. A lively and up-to-date site on all media for development communications, including impact studies from around the world.

www.tao.ca/videazimut/index.html

Videazimut: an international non-governmental coalition promoting audiovisual communication for development and democracy

www.videonetwork.org

Contact Video Network gives practical tips on video production and using video as an activist tool.

Mallard Radio: <http://www.mallard.org/index.html>

This site has technical and sales details of radio transmitting equipment suitable for developing countries, as well as attractive - though short - write-ups about some of the small radio stations Mallard have helped to set up over the years.

AMARC: <http://www.amarc.org>

This is the site of the World Association of Community Radio Broadcasters. It has news of members - who consist mainly of community radio stations in the developed and developing world - and of upcoming events and the occasional reference to interesting research or books on radio.

Radio Netherlands: <http://www.mw.nl/realradio/community/index.html>

This is a useful site for updates in what is happening around the world in community radio ñ much of which is development-oriented.
Further reading on video

PANOS INSTITUTE, (1998) The Internet and Poverty, Panos Briefing no. 28 Panos Institute, London (www.oneworld.org/panos/)

RICHARDSON, D., (1997) The Internet and Rural and Agricultural Development: An Integrated Approach
FAO, Rome (or contact him at the University of Guelph, Canada or through the devmedia website: www.devmedia.org)

STICHELE, P. van der and BIE, S.W., (1997) The Last Mile: How Can Farmers Take Advantage of New Media? FAO, Rome

Web site: www.cgair.org:80/ivdn - the CGIARs web-site about their Integrated Voice and Data Network

Glossary of terms

<i>Communication</i>	The transmission of data, information or knowledge between two or more points. Communication is an active, dynamic process in which ideas and information are exchanged leading to modification of people's knowledge, attitudes or practices.
<i>Data</i>	Recordable facts.
<i>Dissemination</i>	The process of passing on research outputs, or information about research outputs, to uptake pathways.
<i>Dissemination of research output</i>	This has a wider reach than promotion of research outputs and can be considered the process of active circulation of research outputs by the research project to a broad audience.
<i>Dissemination pathway</i>	The route(s) or channel(s) by which information and technology reach the user
<i>End-user</i>	Farmers and others (individuals, households, communities, companies, etc.) engaged in productive activities involving natural resources.
<i>Information</i>	Meaningful combinations of data. Information is data - facts, figures, feelings etc. Information can be communicated. Information may or may not become knowledge. It needs to be transmitted, received, understood and believed to become knowledge.
<i>Intermediate-user</i>	Those who use the outputs of research to produce information, technology and products for end users (e.g. researchers in INARCs, NGOs, private sector, etc.).
<i>Knowledge</i>	The sense that is made of information. Knowledge is created through the accumulation of selected items of information. Knowledge is information which has been interpreted and made concrete in the light of the individual's understanding of the context.
<i>Promotion of research output</i>	This is method for publicising a research output directly to a defined target audience. Often the target audience is an intermediary (for example, the target institution) who will disseminate the research output to the end-user.
<i>Research output</i>	Research results or products appropriate to the project purpose (e.g. information, technologies, methodologies, toolkits, conceptual model). Generally a report on an activity (such as a trip report) is not an output. However, some workshop proceedings for example, are used as outputs because they are a compilation of papers and discussions amongst stakeholders in a project. They contain findings, state of knowledge and agree needed areas of future work.
<i>Stakeholder</i>	Any person, organisation, institution with a direct or indirect role to play in the project. Stakeholders may be defined as primary or key: those who are directly affected by the project outputs. Secondary stakeholders: may not be directly affected by project outputs but they have an interest in the project. Tertiary stakeholders: those with high influence in the project and they can affect outputs, but their interests are not the target of the project.
<i>Uptake pathway</i>	The institutions and processes by which research outputs reach end users; these will include organisations (NGOs, local government extension services, commercial traders) and activities (multiplication of planting material, training).

Sources: Saywell & Cotton, 1999; NRSP, 1999. World Bank, 1999. Project Memorandum, 1999; Norrish, 1999; Garforth, 1998; NRSP Annual Report 1997/98