

# Radio: challenges and potential of using mass media for agroforestry extension in Sulawesi, Indonesia

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## Introduction

The availability of, and access to, information are key factors that determine development success. In agroforestry, information dissemination through extension agents and other communications media links farmers with innovations and solutions that can improve farm management systems in order to increase livelihoods and sustain the environment.

### **Current condition:**

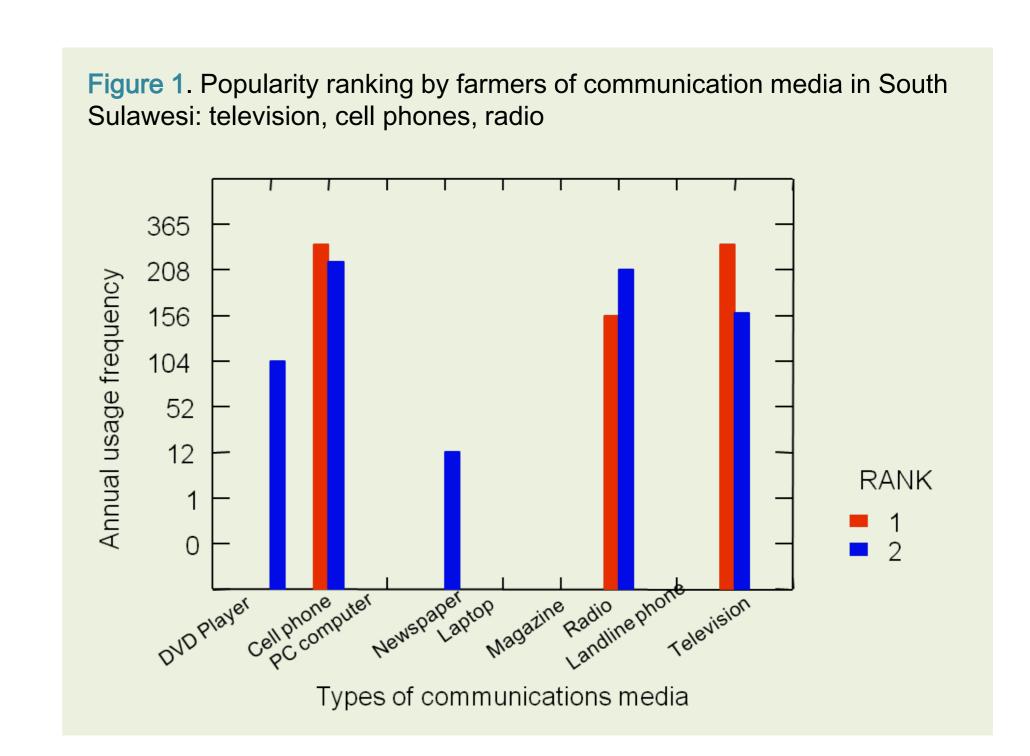
- Dissemination of agricultural and agroforestry information to farmers is mostly done in face-to-face meetings and practical demonstrations by government extension agents.
- The government stated there were 51,428 extension agents in Indonesia, with 35,146 directly assisting individual farmers and farmers' groups in 75,224 villages (Taryono, Lampung Tribun News, 2012).
- According to Law no. 16 of 2006 concerning the Extension System in Agriculture, Fisheries and Forestry, ideally each village has one agricultural extension agent.
- In reality, commonly extension agents are responsible for 3–4 villages.
- The districts of Bantaeng and Bulukumba, in the province of South Sulawesi, and Konawe and Kolaka in Southeast Sulawesi, experience a shortage of extension agents (Martini et al, 2012).

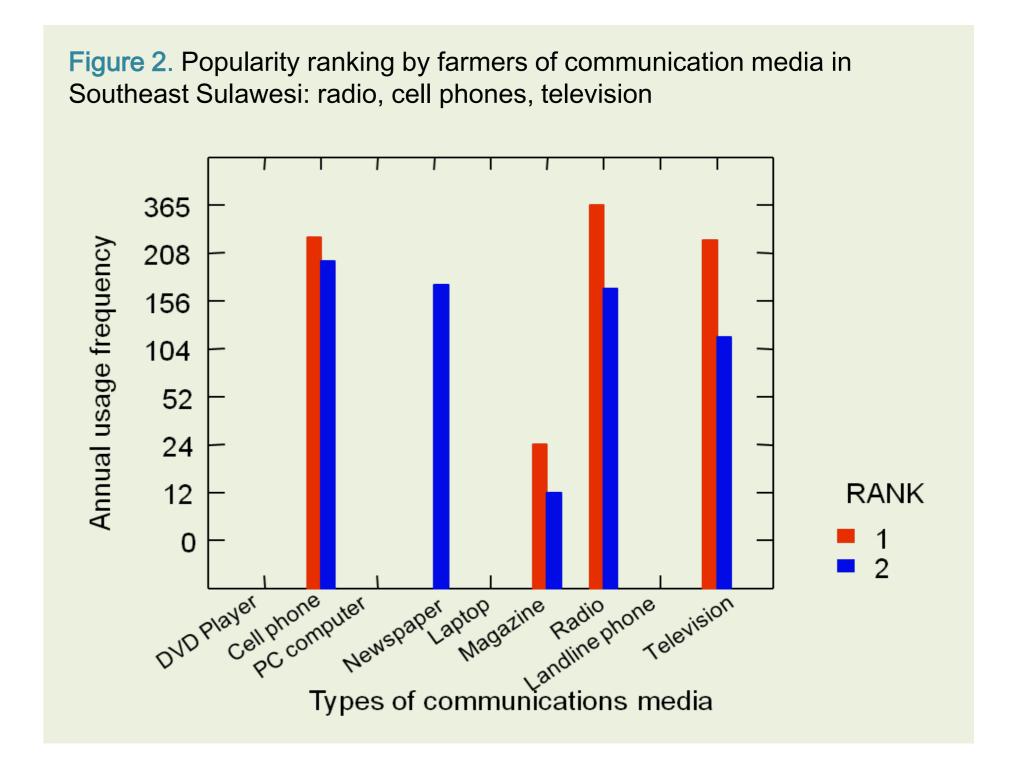
Partly in response to this situation, Agroforestry Farmers' Field Schools (AFFS) were established as part of the project, Agroforestry and Forestry in Sulawesi (AgFor Sulawesi), as the main extension approach to enhance farmers' skills and expand their sources of information.

To complement the AFFS and increase their reach, radio was used to spread information to wider audiences.

#### Why radio?

- Radio is a powerful communication tool (Chapman et al, 2003) that has proved to be an effective medium for promoting agriculture and development in rural areas (Nakabugu, 2001).
- Radio is acknowledged as perhaps the most important medium for communicating with rural populations in developing countries (FAO, 2001).
- Radio is considerably cheaper than television and radio can be accessed using battery-powered devices, such as standalone receivers and cell phones, in areas where mains electricity is intermittent or non-existent.
- Radio is one media form with widest coverage in Indonesia (Centre for Innovation Policy and Governance Jakarta, 2012).
- Though farmers prefer practical demonstrations and face-to-face discussions, in terms of media consumption, data collected in November 2012 from 146 farmers in the districts mentioned above showed that television, cell phones and radio were the top media for receiving information.





## **Implementation**

## Objective of the radio project

To spread knowledge to wider audiences, even to those villages where the AgFor project is non-existent, with the intention that audiences will obtain new information and benefit from it.

#### How it worked



- Talk show involving commodities expert and farmers (recorded)
- farmers (recorded)Duration: 20-30 minutes
- Radio partners

Content

RRI Kendari (in Southeast Sulawesi)

RRI Makassar (in South Sulawesi)

- Developed based on materials of first season of AFFS, on the prioritized species in four
- districts: pepper and clove

  Combined with frequent questions compiled
- from the farmers in the area of AFFS

  Total 4 episodes (2 eps on pepper, 2 eps on clove), aired once a week during 4
- clove), aired once a week during 4 consecutive weeks
- Airing schedule
- April–May 2013
   Aired weekly during a community empowerment program 'Siaran Pedesaan', a popular show that is commonly use to disseminate information by government

Since the format is recorded, call-in and text

 Airing time: RRI Makassar 7.30-8 pm, RRI Kendari 8-8.30 pm

agencies

Feedback

messages live-respond was not possible.
However, a phone number where farmers can
ask questions to was provided at the end of the
show

Cost

- RRI Makassar IDR 12 mio
- (±USD 1000) for 4 eps ■ RRI Kendari – IDR 8 mio (± USD 660) for 4 eps

Duration: 20-30 minutes

Radio drama (recorded)

- RRI Makassar (in South Sulawesi)Radio Cempaka Asri (in South Sulawesi)
- RRI Kendari (in Southeast Sulawesi)
- Developed based on materials of second season of AFFS, on the prioritized species in
- four districts: coffee and cacao
   Combined with frequent questions compiled from the farmers in the area of AFFS
- from the farmers in the area of AFFS
   Total 4 episodes (2 eps on cacao, 2 eps on coffee), aired once a week during 4 consecutive weeks
- Nov-Dec 2013
   For RRI → aired weekly during a community empowerment program 'Siaran Pedesaan', a popular show that is commonly use to disseminate information by government agencies. While for Radio Cempaka Asri →
- Airing time: RRI Makassar 7.30-8 pm, RRI Kendari 8-8.30 pm, Radio Cempaka Asri 6.30-7 pm

it was aired every Saturday

- Since the format is recorded, call-in and text messages live-respond was not possible. However, a phone number where farmers can ask questions to was provided at the end of the show
- RRI Makassar IDR 5.8 mio (± USD 483) for 4 eps
- Radio Cempaka Asri IDR 5.6 mio (± USD 467) for 4 eps
- RRI Kendari IDR 12 mio (± USD 1000) for 4 eps

## Radio stations

- Radio Republik Indonesia (RRI) is a state-owned network that was established at the time of Indonesia's independence in 1945. It has stations in almost every province in Indonesia.
- The radio partner was selected by analyzing the data about the stations that farmers accessed the most.

Count of Stasiun			
Types of media (TV or radio)	Name of station	Total	%
Radio	Campaga Asri	13	15.29
	Celebes	1	1.18
	Cemara	2	2.35
	Gamasing	2	2.35
	Kantata	2	2.35
	Mitra	1	1.18
	Pantai Selatan	13	15.29
	RRI Gorontalo	1	1.18
	RRI Kendari	38	44.71
	RRI Makassar	5	5.88
	RRI Nasional	4	4.71
	None	3	3.53
Radio Total		85	

Television is an effective mass medium for farmers but is expensive to produce. As a comparison, the cost of buying a segment/blocking segment per episode in a program on a national television station ranged IDR 100–400 million (±USD 8300– 33,300).



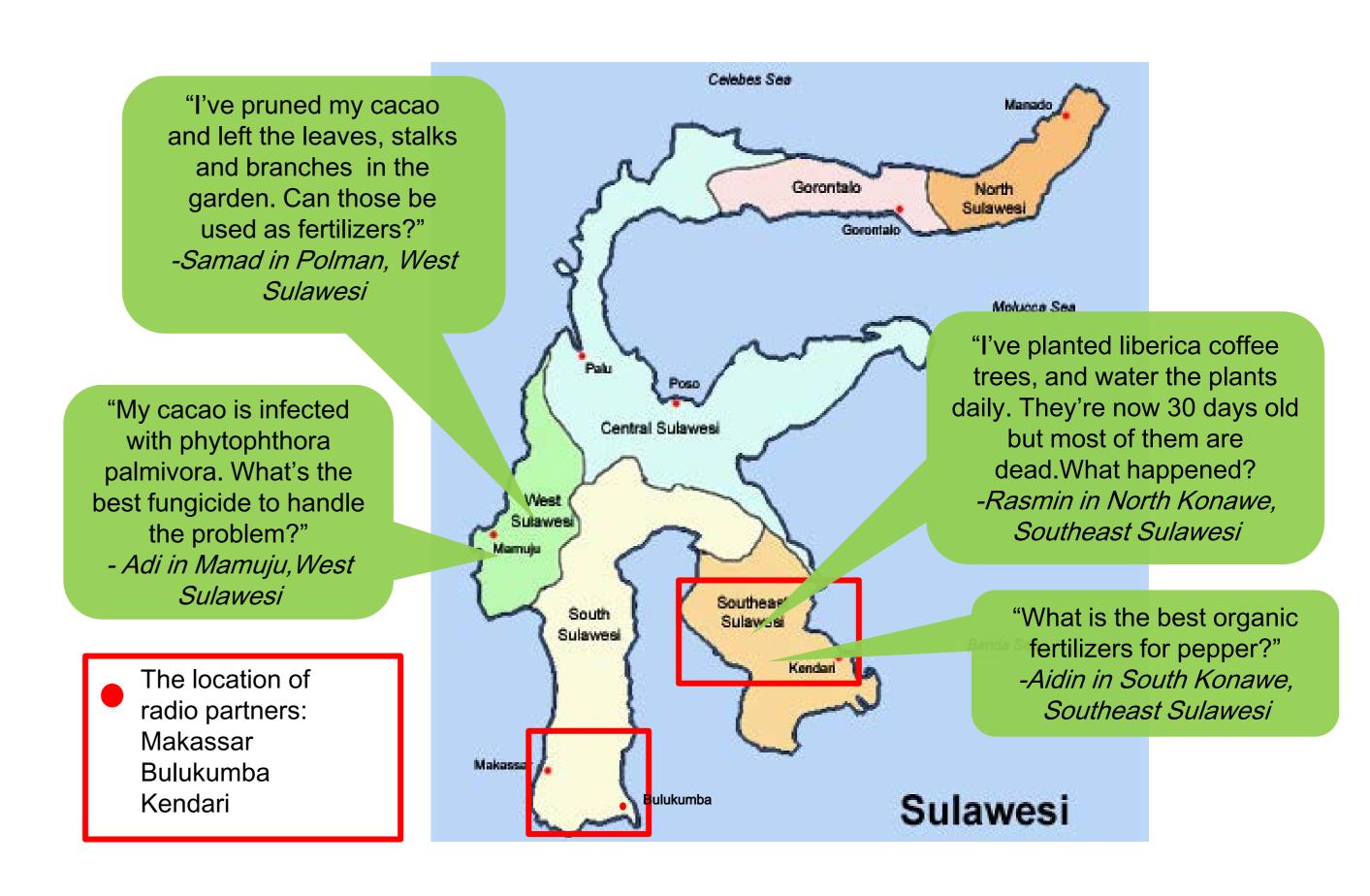


# Learnings

- Despite the short airing period, the programs (both talkshow and radio drama) received text message feedback from farmers.
- The farmers' questions were practical, mostly related to pests, diseases and garden management.
- Radio is indeed a good medium for agricultural and agroforestry information because it reaches a wide area, cheaply. In this case, even the neighboring province received the information.
- The talkshow and radio drama were an opportunity to link farmers with information sources.
- The use of simple language is crucial to make the content easy to understand. The farmers' average level of education was low; some were illiterate.
- The use of local dialects and local settings helped the content become more relevant for
- farmers.
   Inclusion of the specialist programs in a community-empowerment program is a good idea because the latter already has its own loyal listeners and is often referred to as a source of information.
- Compilation of questions from the field is critical for developing material for the programs.
   Consequently, program content represented the actual problems that farmers were dealing with.
- Program evaluation has been planned and will be carried out in 2014.

# Challenges

- The limited facilities, technology and human resources of each radio station, especially local stations, affects program quality.
- The AgFor radio programs only ran for short periods. To have more clearly visible impact, a longer- term program is highly recommended.
- There are a few agriculture-focused community radio programs initiated by the government, such as Radio Pertanian Ciawi (Bogor, West Java), Radio Pertanian Wonocolo (Surabaya, East Java), Radio Citra Pertanian (Palu, Central Sulawesi), and a community empowerment program, Siaran Pedesaan, on RRI. This is a good first step, however, in the future, government support is needed to expand community radio to other areas and to develop material on major commodity species.









**CONGRESS ON** 

# Acknowledgement

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