• Visible and Invisible Self-Managed Irrigation Organizations
edo de México

Cuautitlán 7,500 hectáreas,
Teoloyucan 1,420 hectáreas
Coyotepec 346 hectáreas.
Coahuila

Nazas
small systems
100 to 1,911 hectares
edo de México

Tejalpa
1,498 hectáreas
88 tanks
Michoacán

Coeneo-Huaniqueo
2,000 hectares
(artificial flooding)
Guerrero

La Cañada

19 small dams, interconnected systems
3,000 hectáreas

all riparian trees are planted
edo de México

Tepetitlan

9,721 hectáreas
Croquis núm. 1. Esquema general del sistema.
Morelos

Metepec and Tenango

very small systems (water conduction by hose)

743 hectáreas
The cases are by groups by date of origin of the organization:

- colonial
- early XXth c
- with no legal framework
- and ongoing
1) The persistence of very old organizations, dating from colonial times.

Cases of this type are not frequent, due to changes in land tenure:
the concentration of property in the late XIXth c
that displaced peasant community tenure,
the agrarian reform in the 1930s that dispersed property.
The persistence of very old organizations, dating from colonial times

In three cases, however, we found little disruption due to changes in land tenure as well as persistence of very old organizations.
The persistence of very old organizations, dating from colonial times

Resistance to government imposed changes

a) integration into a government managed Irrigation District, displacing self-management

b) new boundaries: integration of several systems into one river wide organisation
The persistence of very old organizations, dating from colonial times

**Juarez**

1,800 hectares

Integration into an Irrigation District

the irrigators refused access to the government staff and kept control of operation

This situation lasted from the 1950s to the late 1990s with turn-over of the Irrigation District. Some 50 years.
The persistence of very old organizations, dating from colonial times

**Valle de Santiago**
10,000 hectáreas
Integration into an Irrigation District

government staff took over the management.
The persistence of very old organizations, dating from colonial times

However, the irrigators

a) maintained solidarity and have a history of successful negotiation with the Irrigation District authorities and

b) after turn-over in the 1990s they became a model case for successful turn-over.

The suppression of self-governance lasted from the 1930s to the 1990s, that is some 65 years.
The persistence of very old organizations, dating from colonial times

Cuautitlán
7,500 hectáreas
+ 2 other small systems: 9,200 hectáreas

government proposed river wide organization

all the Irrigation systems on the river refused the centralization in one self-managed organization
one by one they managed to split away (officially) from the river wide organization
The persistence of very old organizations, dating from colonial times

In the 1970s three of the systems that take water from the same dam established a non-official committee.

The non-official committee has lasted from the 1970s to nowadays, some 40 years.
2) The persistence of early XXth c organizations, created after the agrarian reform

Resistance to government imposed changes:

a) integration into a government managed Irrigation District, displacing self-management

b) changes in legal framework, the larger organisational level has no legal backing
The persistence of early XXth c organizations, created after the agrarian reform

Ixmiquilpan
3,700 hectáreas
Integration into an Irrigation District

the irrigators refused access to the government staff and kept control of operation

This situation lasted from the 1970’s till turn-over, some 30 years.
The persistence of early XXth c organizations, created after the agrarian reform

**Nazas**
several small systems, the largest 1,700 hectáreas
total 10,000 hectares

Integration into an Irrigation District
local organizations were officially suppressed

in these small systems continuity of local management, based on horizontal agreements
The persistence of early XXth c organizations, created after the agrarian reform

Even after turn-over, the local, traditional, management is still in place, as the government schema for the new self-managed organization is too large and too centralized.

The local, traditional, un-official management has lasted from the 1960s to nowadays, some 50 years.
The persistence of early XXth c organizations, created after the agrarian reform

Tejalpa
1,500 hectáreas and 88 tanks

official framework for the organization disappeared in 1992.

Notwithstanding, management, after some turbulence, is still in place.

Some 20 years with a non official organization
The persistence of early XXth c organizations, created after the agrarian reform

Nexapa

12 irrigation systems with a common dam and tunnel to convey water from one river to another 8,000 hectares

In the 1960’s the 12 systems created a non-official commitee to take care of the dam and tunel, as well as to share water
The persistence of early XXth c organizations, created after the agrarian reform

Each irrigation system had an officially recognized organization. However the official framework disappeared in 1992. Management is still in place.
The persistence of early XXth c organizations, created after the agrarian reform

The headwork of the 12 systems (the dam and tunnel) needed considerable overhaul and the National Water Commission only had budget for Irrigation Districts, the multi-system organization has integrated as an Irrigation District on condition of retaining the traditional organization
The persistence of early XXth c organizations, created after the agrarian reform

The larger un-official committee has lasted from the 1960’s to the present, some 50 years.

The irrigation systems committee have lasted from the 1990’s to the present, some 20 years.
3) The **creation of organizations**, mostly horizontal agreements between communities, after the agrarian reform **w/ no official legal framework**
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**Coeneo-Huaniqueo**

2,000 hectáreas

horizontal agreements between communities since the agrarian reform to the present
The creation of organizations, mostly horizontal agreements between communities, after the agrarian reform with no official legal framework.

La Cañada
19 interconnected systems
3,000 hectares
horizontal agreements between communities since the agrarian reform to the present
The creation of organizations, mostly horizontal agreements between communities, after the agrarian reform with no official legal framework.

For some of the systems, in the 1990’s the government created and registered official organizations, however with different boundaries than those in the traditional organisation.

The official organisation has not been adopted.
4) Ongoing: Replacement of government management for local community-based management.
Ongoing. Replacement of government management for local community-based management

Tepetitlán
9,700 hectáreas
a government managed Irrigation District
dominated by traditional Indian communities,
although there was little participation in community level water distribution
Replacement of government management for local community-based management

with turnover in the 1990’s there is turbulence: the communities refused an expensive bureaucratic type self-governance

The new organization is mostly centered in the communities and successfully, as timing of water delivery has improved
Replacement of government management for local community-based management

the system has an official legal framework; however management does not follow the official pattern – some 20 years
<table>
<thead>
<tr>
<th></th>
<th>irrigated surface</th>
<th>informality: years</th>
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<tbody>
<tr>
<td>Juarez</td>
<td>1,600</td>
<td>50</td>
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<tr>
<td>Valle de Santiago</td>
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<td>65</td>
</tr>
<tr>
<td>Cuautitlán</td>
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The case studies show that informal organization is quite extensive and successful. And not only have they succeeded in holding on to their organizations they have created new organizations with no official framework by means of horizontal agreements or by adding a second or third tier of organization.

Visibility of the organizations rather than existence may be an issue.
I think we need to take a closer look at how irrigation system self-management is resilient in spite of lack of legal frameworks or government recognition.

More attention should be given to factors such as: How aggressive is the government policy? What does it attack? Water rights? Does it try to suppress local management and expand government management?

What conditions are relevant so that irrigators can take over the management of an irrigation system?
My impression is that, at least in Mexico, government policies and legal frameworks that fragilize the community level organization are more dangerous to self management that those dealing with the larger organization, because for small holders the community is a building block to other larger multi-community organizations.