



# THE PRACTICAL ASPECTS OF URBAN WATERBODY REGENERATION

# WHAT I'M GOING TO TALK ABOUT:

- The problems we are asked to address
- The approach we take
- The techniques we apply
- The results

The emphasis is on “PRACTICAL”, i.e. achieving things in the water

# **PROBLEMS WE ARE ASKED TO ADDRESS**

- Algal Growth
- Low Biodiversity
- Lack of Amenity

## **CAUSED BY:**

- Eutrophication
- Change of Use
- Water Birds

# EUTROPHICATION





Dedridge Pond, Livingston





Inverleith, Edinburgh





Cammo, Edinburgh





Scone Park





Lido pool, Stenhousemuir



**CHANGE OF USE**





South Inch, Perth









Rouken Glen, Glasgow



# WATER BIRDS





Inverleith, Edinburgh



Hogganfield, Glasgow





# THE APPROACH WE TAKE

Very basic techniques:

- Drop nutrient levels as much as possible
- Plant as much as possible
- Build boardwalks and platforms to increase amenity

# DESILTING





# TRAPPING INCOMING SEDIMENTS / DISSOLVED NUTRIENTS



Harmeny School, Balerno



Inverleith, Edinburgh





# PLANTING – Timber Rolls



Rouken Glen, Glasgow



**Blackford Pond, Edinburgh**







Coppice Pond, Bradford



# PLANTING – Boards

Inverleith, Edinburgh







South Inch, Perth



# PLANTING- Stone



Auchinlea, Glasgow



**Scone Park**







Hogganfield, Glasgow



# AMENITY – Boardwalks and Platforms



South Inch, Perth





Figgate Pond, Edinburgh





Coppice pond, Bradford



South Inch, Perth

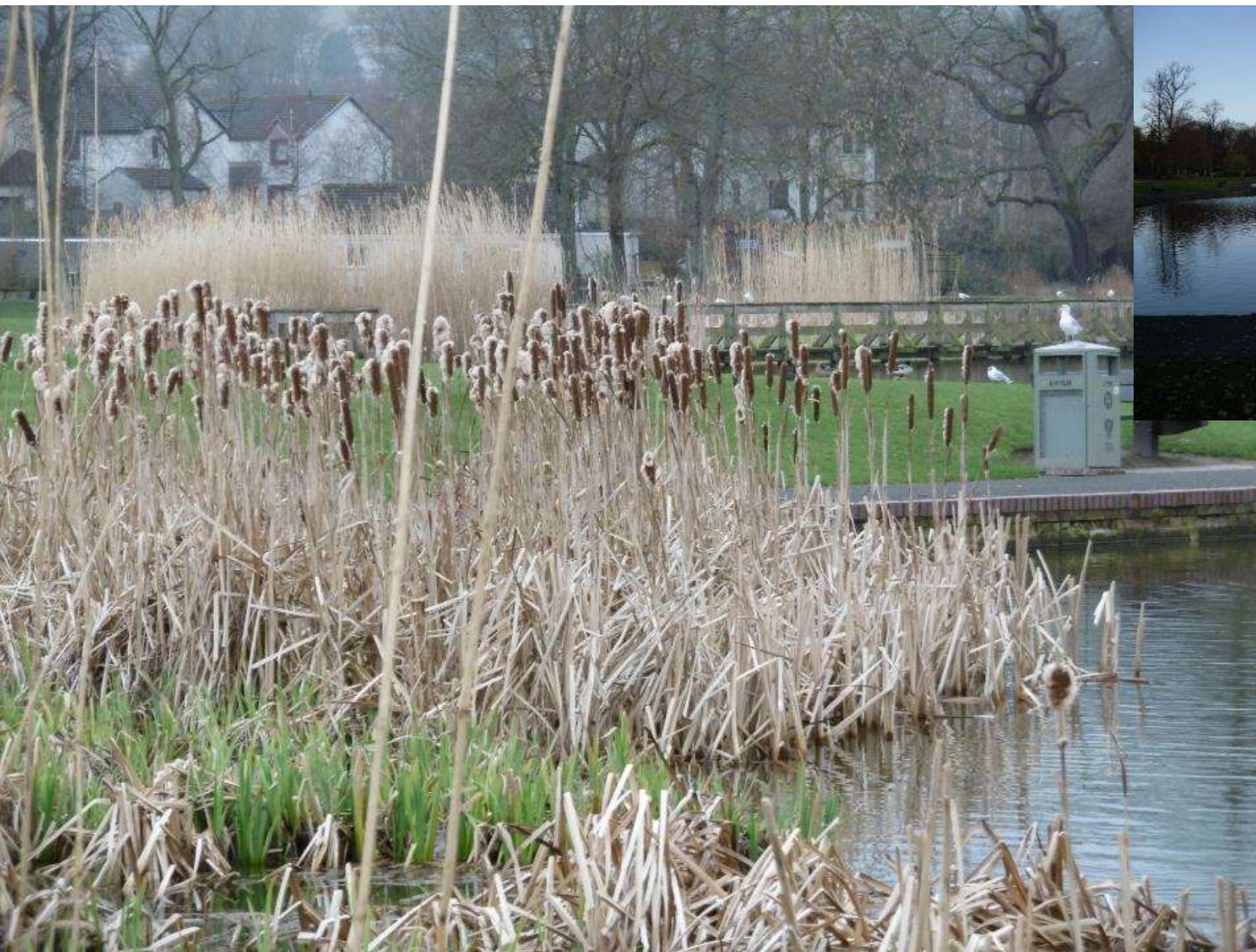




# RESULTS

## Planting





**South Inch, Perth**





**Rouken Glen,  
Glasgow**





**Auchinlea**





**Lido Pool,  
Stenhousemuir**







**Inverleith,  
Edinburgh**





# RESULTS

# BIODIVERSITY





**Coppice Pond, Bradford**







**Inverleith,  
Edinburgh**





Frogs spawn every Spring in the plants in the big pool. The tadpoles leave the pond as tiny frogs in the autumn before hibernating in Winter.

Moorhen and coot look quite similar except that the moorhen have red markings on the heads and the coot white. They both come out onto the grass to feed when it is quiet. Both species raise chicks here.



## The Lido is home to a wide a range of fish, amphibians, birds and insects.

There is now an established pair of mute swans that build a nest on the island every year. The nest is built by the female (the pen), while the male (the cob) supplies the materials. The female lays up to seven eggs between late April and early May and both sexes incubate the eggs, which hatch after 35-41 days. The young birds, or cygnets, sometimes ride on their parents' backs and remain with the adult birds for four to five months.



Sticklebacks build their nests in the pondweed growing in the water. Sticklebacks are the classic "tiddler" of British waters and many other areas in the northern hemisphere. They have sharp spines on their back which provide protection against predators.



Mallard ducks also breed here, the tiny ducklings are very vulnerable to crows and gulls so the ducks have a big family so that at least some of them survive to be adults.



Regeneration of the Lido pond was carried out by





# RESULTS

# AMENITY



Inverleith, Edinburgh







Rouken Glen, Glasgow





Coppice Pond Bradford



Figgate Pond, Edinburgh







Inverleith, Edinburgh