

Why it is hard to get an irrigation scheme up and running

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Irrigation schemes promise increased agricultural output and more efficient and sustainable use of New Zealand's precious water resources. In addition to addressing the environmental and political controversies that this promise can provoke, prospective schemes must overcome significant hurdles before they can deliver these productivity and efficiency gains:

- Extensive scoping and feasibility studies are required to establish whether an irrigation scheme is feasible. Aside from technical feasibility, the strength, distribution and elasticity of irrigator demand are crucial factors. There is little point in developing a scheme if there will be insufficient demand in the command area at the projected price for water over the long term.
- Irrigation changes the environment by diverting water from its natural course to serve agricultural needs. Unsurprisingly, the activities required to effect such radical change are tightly controlled by New Zealand's core environmental regulation, the Resource Management Act 1991. Resource consent applications and subsequent appeals can drag on for years, and may ultimately be unsuccessful or require compromises which affect scheme viability. These processes require specialist technical and legal expertise to navigate a complex regulatory environment. The costs can be eye-watering, particularly when there remains doubt as to whether the scheme concerned will actually proceed.
- Irrigation schemes generally require extensive capital expenditure on design, infrastructure and land access rights.

All of these hurdles require significant time and money to overcome. Any promoter of, or investor in, an irrigation scheme runs the risk that the scheme will never be economically viable or actually built. Stakeholders (including iwi and local and central government), funders and, most importantly, irrigators themselves must reach agreement on the issues and have a great deal of faith and sustained commitment. As Sir John Key once put it, a successful irrigation scheme almost always requires "a large number of people to hold hands".

In most, if not all, cases it is the irrigators who will ultimately pay for the scheme. In light of the numerous risks and distant rewards, irrigators are often reluctant to commit their financial resources at an early stage, and may wish to wait and see how a scheme progresses before joining – essentially freeriding on the risks taken by earlier participants. Collective irrigator inaction on any significant scale can be fatal to a scheme, or force a return to the drawing board. Only strong community leadership and unity of purpose can overcome this dynamic.

While it is no substitute for strong irrigator buy in, a well resourced and committed sponsor can be the crucial factor in an irrigation scheme's success. As well as providing funding capital, labour and enterprise such a sponsor can assist with co-ordination, timing and holding costs which are so often problematic for irrigation schemes. Central government, through the Irrigation Acceleration Fund and Crown Irrigation Investments Limited has been prepared to sponsor schemes in the past. It is not yet clear whether central government support will extend beyond honouring existing commitments under the new Labour led government.

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