

Israel's Water Sector – Policy & Acts towards Sustainability

Israel has suffered a chronic water shortage for years. In recent years however, the situation has developed into a crisis so severe that allocation of water for urban use in the summer of the year 2002 almost didn't meet requirements in spite of the fact that there were 50% administrative cuts in agricultural supply. During the crisis, we have reached & crossed all operational lines in all national aquifers.

Although we've had two relatively good years of replenishment, the current cumulative deficit in Israel's renewable water resources amounts to approximately 1000 million cubic meters, while the total potential storage is estimated 3,000 million cubic meters, An amount that exceeds the annual urban & industrial demand by 20% percent.

One crucial issue is the increasing contamination of the natural water resources, mainly due to their over exploitation and high intensive surface development.

The main reasons for the crisis are:

- Consecutive years of drought in the region.
- Increased demand by population growth & the rising standard of living.
- A wrong policy of stretching the renewable water sources to the limit.

All activities in water sector since this crisis are based on a new water sector policy that incorporates a sustainable development plan which is founded upon three basic components:

1. Ensuring water supply
2. Social economic requirements
3. Environmental and ecological needs.

The implementations of these principles in the water sector policy are:

All natural resources must be preserved and protected from the point of view of both quantity and quality. The improvement in supplied water quality will reduce the accumulation of salts in the aquifers. Intensive action is being taken to deal with contaminated parts of the aquifers.

Manufactured water will be the source for future increasing demand and the fulfilling of existing and future agreements with our neighbors. Regional plans must be focused on the production of new water resources and not on the redistribution of scarce and insufficient resources.

Every drop of sewage effluents must be reused in adequate quality, taking into account cultural aspects. Sewage effluents will be the main water resource for agriculture in our region. Municipal and industrial usages are being investigated.

Preserving water must become a way of life in our region. Economic methods such as water saving devices and advanced technologies for irrigation should be used. Appropriate legislation must lead people to water saving activities. Education and explanation will ensure long term results.

By reducing water pumpage in the natural water resources and thereby elevating water levels, Nature will be compensated after years of depletion.

On the basis of this policy, the Water Commission consolidated a national master plan for the Israeli water sector. [The master plan was originally built for the years 2002-2010 with the main goal of leading the water sector from a situation of crisis to a situation of stability. The plan has solid foundations of sustainable development.

In conjunction with this plan another long term plan for the year 2040 is being prepared as part of a national effort to implement strategic policies in all governmental ministries. (The effort is being coordinated by the Ministry of Environment)]

On the basis of [the short term] plan The Government of Israel has already made some decisions and started implementing some of them:

1. The construction of seawater desalination plants with an installed annual capacity of 315 MCM & an additional 50 MCM annual capacity for brackish water desalination. [(This amount is 20 % of the total demand in 2010)].
2. Israel will import from Turkey 50 MCM of fresh water annually over a period of 20 years.

3. The amount of total reclaimed treated sewage for agriculture will be increased from recent 300 up to 500 MCM.
4. 50 MCM of polluted wells will be rehabilitated.
5. 15 million dollars will be allocated for supporting water conservation projects.

The plan is that all projects will be gradually completed by 2010.

Additional points regarding the implementation of sustainable development policy:

In recent years, the Water Commission has been developing decision support systems for planning & operating our national water system and reservoirs.

During the last few months there has been an effort to combine the environmental organizations to form “round table” discussions under the policy of “Fish Ball Planning”.

The policy & the acts presented here are part of an ongoing effort for sustainable development in Israel & in the whole region.

Thank you !