

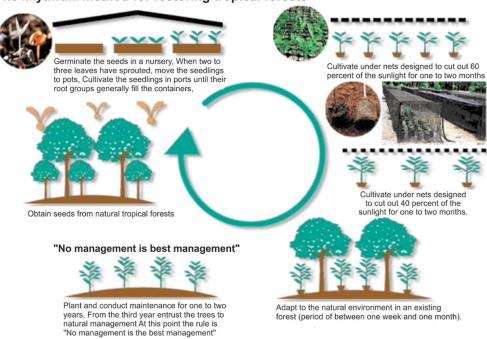
Miyawaki Technique

Why in News?

In preparation for Mahakumbh 2025, dense forests have been developed at various locations across Prayagraj, to ensure pure air and a healthy atmosphere for the millions of devotees expected to visit the city.

- **Miyawaki Foresting** An ecological engineering technique of afforestation, involves planting a diverse range of <u>native tree species in a small area</u>, which then grow into a **dense**, **multilayered forest**.
- **Developed by** *Japanese botanist Akira Miyawaki* in 1970s.
- **Aim** To create a self-sustaining forest, with a high level of biodiversity and to restore degraded land and combat climate change.
- **Process** It involves planting *trees and shrubs close* to one another to accelerate their growth.
- Plants *grow 10 times faster* with this technique, making it a practical solution for urban areas.
- A completely *maintenance-free*, wild and native forest *after the* 1st 3 *years*.
- 4 steps of Miyawaki foresting technique
 - Initial survey of the locality
 - Collection of the seeds
 - Preparation of planting sites
 - Planting

The Miyawaki method for restoring tropical forests



Miyawaki Technique is also known as **Pot Plantation Method**.

- Benefits *Up to 30 times more dense* than conventional plantations.
- Up to 30 times better *noise and dust reduction*.
- Up to 30 times <u>better Carbon-dioxide absorption</u> as compared to a monoculture plantation.
- It is highly effective in the establishment of *urban forests* as well as converting unproductive wastelands into ecological and socially beneficial productive lands

The Prayagraj Municipal Corporation has utilized the Japanese Miyawaki technique over the past 2 years to establish multiple oxygen banks, which have now transformed into lush green forests. It also contributed to improving air quality, playing a crucial role in environmental conservation.

Reference

PIB| Green Mahakumbh using Miyawaki Technique

