

Marsileales -

Marsilea :-

Classification :-

Sub-division - Pteropsida.

Class - Leptosporangiatae

Order - Marsileales.

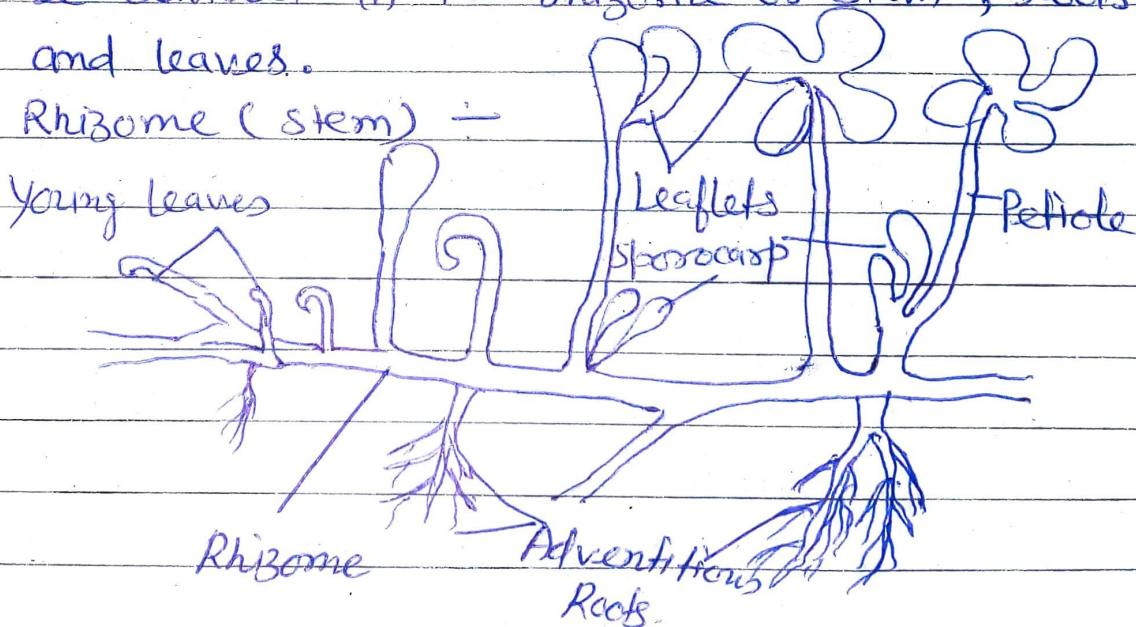
Family - Marsileaceae

Sporophyte :-

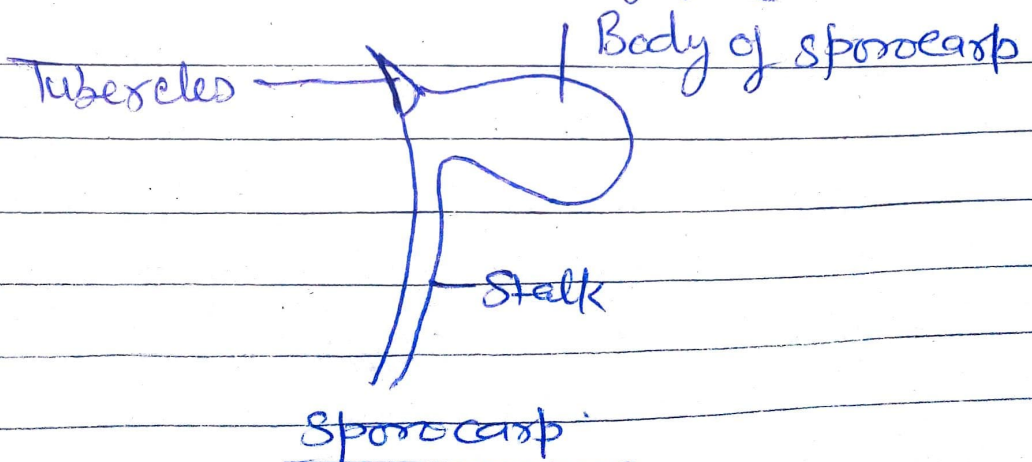
External Morphology :-

The plant body is sporophytic and can be divided into rhizome or stem, roots and leaves.

Rhizome (stem) -



External Morphology of Marsilea



The stem of *Massilia* is modified in to a and slender rhizome which creeping in nature or is subterranean grow upto 25 meters.

It is profusely branched and also forms a mat.

Stem is differentiated into nodes and inter nodes.

The internodes are longer in aquatic species than in semi-aquatic or terrestrial species. Underground tubers are formed on rhizomes.

Root —

The primary root is ephemeral and one or more adventitious roots arise at the node on the underside at inter nodes.

The number of roots at a node and their size vary considerably (2-13 cm).

Leaves —

The leaves are long petiolated and compound. They borne at nodes and are arranged in two alternate rows on the upperside of the rhizome. The young leaves are strongly circinate.

The lamina is usually divided into four leaflets, but may vary from 3-8.

The leaflet is obovate, elliptical or wedge-shaped with entire or dentate margins, and deeply bilobed. (*M. macrocarpa*) also.

At the base of petiole many bean shaped or oval and stalked spones are present.