Ecological character

There are the following types of wetlands: salty lakes, fresh water lakes, steppe karasu rivers, drying up swamps and marshy meadows.

Salty lakes occupy the greatest area - about 21 square km. They are characterized by deep hollows with steep and at some places precipitous slopes, thick loamy bed and coming out of ground waters in the lower part of the slopes. Drying up places of salty lakes are occupied by annual saltwort *(Petrosimonia triandra),* Ofaiston *(Ofaiston monandrum)* and common reed (*Phragmites australis),* annual saltwort *(Petrosimonia triandra), s*eepweed *(Suaeda corniculata)* associations, which in the upper part are alternating with Podorozhnik solonchakoviy (*Plantago salsa),* marsh-rosemary *(Limonium gmelinii)* groups and saline soil glades, at some places there are Halimion borodavchatiy (*Halimione verrucifera)* associations and Roth-weed grass *(Puccinellia tenuifolia),* Hauptian alkaligrass *(P. hauptiana)* meadows. On the first terrace there are various meadow associations with domination of meadow barley (Hordeum *brevisubulatum), q*uick grass *(Elytrigia repens), c*hee reedgrass *(Calamagrostis epigeios),* Altai wildrye *(Leymus angustus)*. The second terrace is characterized by Volga fescue (*Festuca valesiaca),* bridal veil *(Stipa capillata)* associations with plenty of Sophora root (*Pseudosophora alopecuroides)* and feather grass (*Stipa pennata)*. On steep hollow slopes there are desert halophyte semi-bushes silver sagebrush (*Atriplex cana),* sea-lavender (*Limonium suffruticosum*).

Along the shores of Urkash Lake glasswort (*Salicornia europaea)*, halophytic succulent semi-shrubs *(Halimione verrucifera* and *Halocnemum strobilaceum)* associations prevail in combination with perennial Roth-weed grass *(Puccinella tenuiflora)* meadows, low reed and halophytic wormgrass (Artemisia *nitrosa), Saussurea solonchakovaya (Saussurea salsa).* On the first terrace a complex of Roth-weed grass *(Puccinelia tenuiflora)*, halophytic wormgrass (*Artemisia nitrosa)*, and camforosma (*Camphorosma monspeliaca)* associations is represented, feather grass *(Achnatherum splendens)* is usual. At higher places there are Volga fescue (*Festuca valesiaca),* halophytic wormgrass (*Artemisia nitrosa)* steppes. On soils where clay comes out, there is usually perennial saltwart (*Anabasis salsa)* and Levant wormseed (*Artemisia pauciflora)*.

On the second terrace of lake hollows Bridal veil *(Stipa capillata)* steppes on sandy loams prevail. Sometimes there is licorice *(Glycyrrhiza uralensis)*. In the streams formed by springs there are 10 weed species but there is none of them in the lakes.

Small fresh water lakes and marshy meadows, in comparison with salty lakes occupy higher geomorphologic levels and they are characterised by not deep hollows with sloping sides, lack of springs and poor development of low meadow flood plain. The lake depth is varying from 0.5 to 1-1.5 m. Reed with bulrush and cattail form thick vegetation of border, border-curtain and mosaic type. There is plenty of water vegetation. Short river beds are cut deeply; their banks are framed by a narrow border of reed, bulrush and cattail. In deep hollows flooded in the spring by thaw water swamps both fresh water and salty ones, marshy meadows are being created, but by the middle – end of June they usually dry up. On flat sloppy places filled by ground waters in salty lake hollows there are also marshy sedge meadows.

On the watersheds main vegetation types are presented by feather grass (*Stipa pennata),* bridal veil *(St. capillata),* wheatgrass (*Agropyron fragile),* blue hair grass (*Koeleria glauca),* dwarf everlast *(Helichryzum arenarium)* steppes and plenty of psamophyte motley-grasses (dwarf everlast - *Helichryzum arenarium, Chertopoloh (Centauria sibirica),* Greater Knapweed - *C. scabiosa,* cinquefoil - *Potentilla arenaria, Astragal kamnelomniy (Astragalus rupifragus), Astragal puzirchatiy (A. physodes),* broomleaf toadflax - *Linaria genistifolia*). Not deep flat hollows and hollow slopes are

characterized by thick bushes: Iberian spirea *(Spiraea hypericifolia), Rakitnik Russkiy Cytisus ruthenicus,* cinnamon rose (*Rosa cinnamomea).*