

Weather conditions of summer season in Azerbaijan

S. Khalilov, U. Mamedova

Azerbaijan NMHS

In SEECOF framework the summer season (JJA) 2010 was predicted (by most of Centers) mainly dry and hot. *Temperature in forecast maps from Centers of MeteoFrance, UK Metoffice, ECMWF were given mainly above the normal, precipitations below the normal. Only prediction of Hydromet Center of Russian Federation had opposite forecast.* Based on these predictions and analogue method, temperature and precipitation regime for the Azerbaijan predicted as near normal for 3 month.

As mountain country Azerbaijan has different climatic zones. Climate of mountain areas is different from climate of plain areas. Usually, in plain areas summer season is dry and hot, but in mountain areas the beginning of summer is wet, especially in June there is a period of maximum precipitations.

Summer season:

Actually in plain areas the summer season 2010 passed dry and hot, but in highlands and foothills the weather in summer had moderate character.

During all summer season 2010 extreme weather conditions were recorded in Republic. Strong positive (extreme) temperature anomalies occurred over all country. Average temperature over the country was 4-6⁰ C, even on 05th of June Baku city station recorded up to 8⁰ C above the norm. During some days maximum air temperatures were above temperatures recorded during the long-term period over many parts of Azerbaijan. As a result in August were occurred forest fires in some parts of the country. The agriculture sector was suffered from drought.

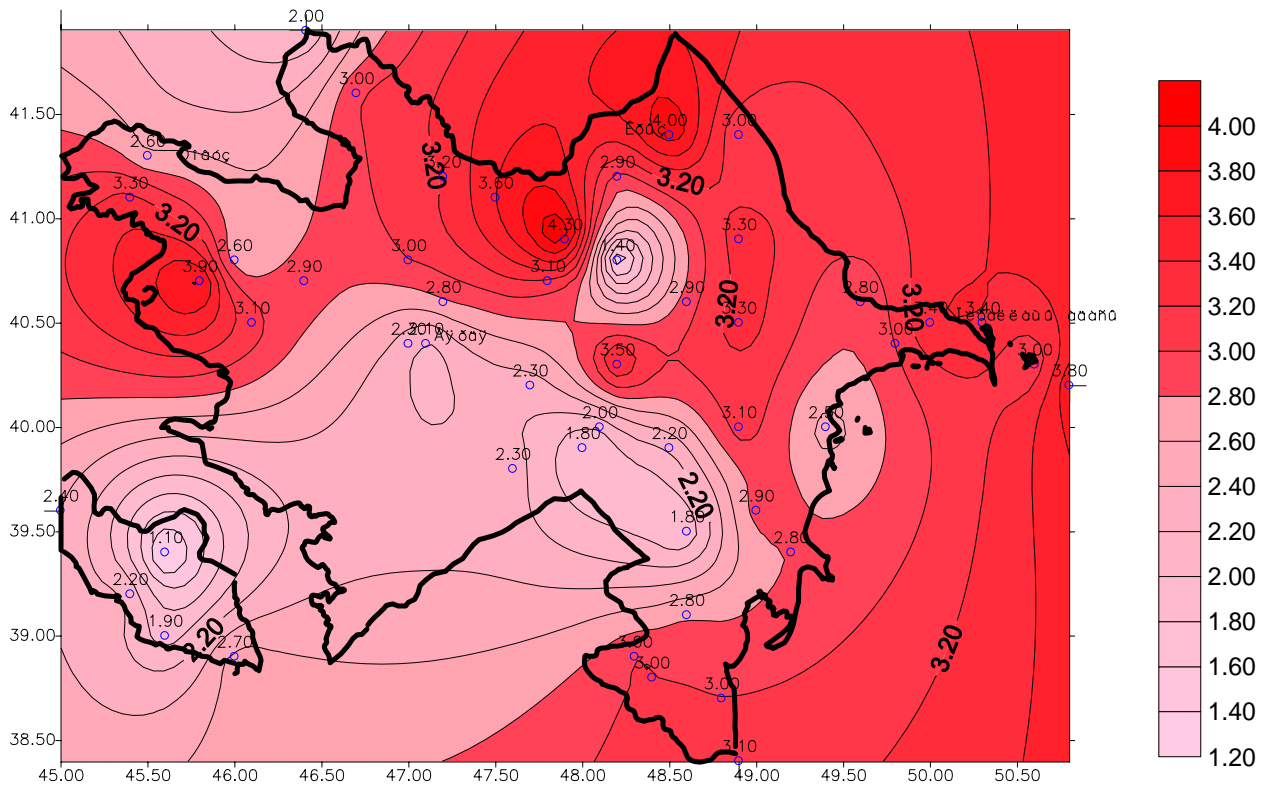


Fig. 1. The temperature anomalies in summer season 2010.

However, in spite of the fact that first part of Summer (especially June) passes moderate, during all summer season Azerbaijan influenced by high pressure area and weather conditions over all summer season were mostly dry and hot. The intensive rainfall observed in the country only in first part of the June and caused strong floods over the all country.

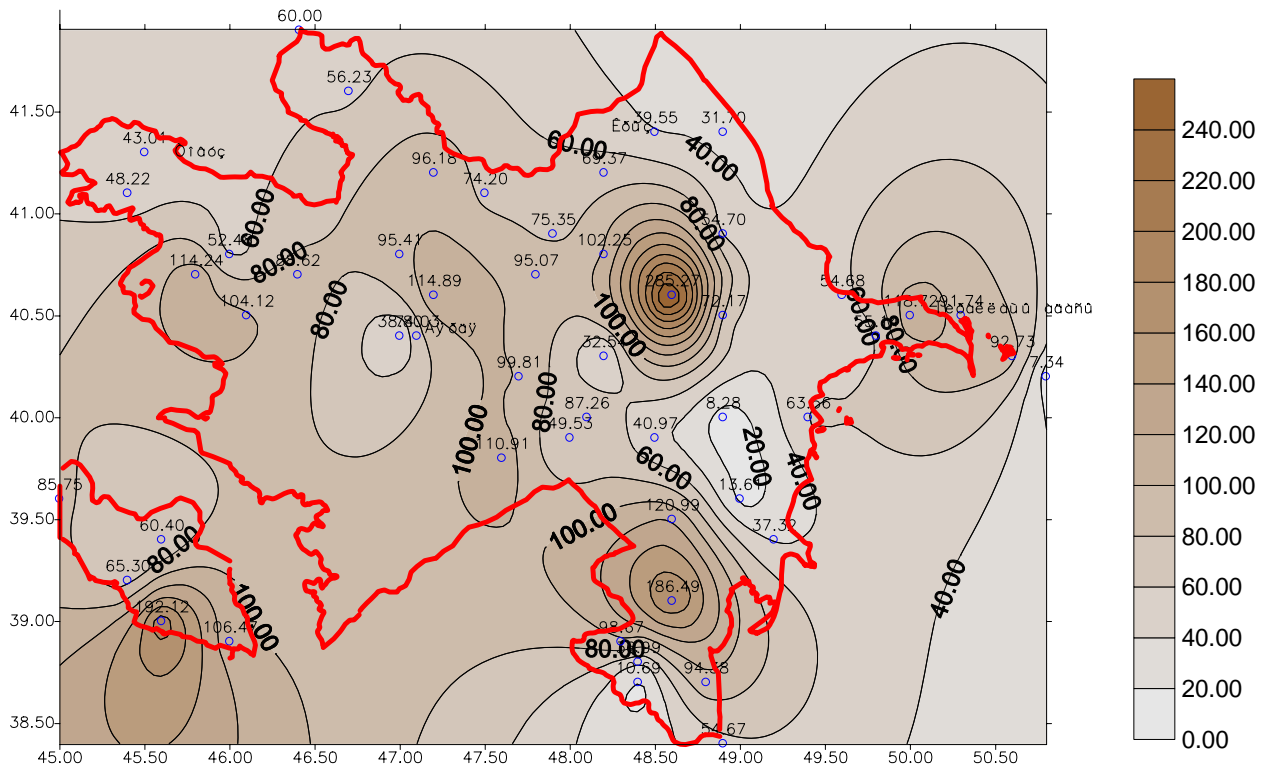


Fig.2. The precipitation anomalies in summer 2010.

Floods event: flooding between April and June were observed in the country. The most strong flooding was during May. As a results of long duration of intense rainfall the level of rivers were rised and caused the widespread flooding.

Daily life in these regions was affected: a several villages were flooded. Floods caused huge damages: hundreds of houses, bridges, roads, electrical lines were destroyed. The agriculture sector had a big losses also. The most intensive flooding was observed on the Kura river, which is a biggest transboundary river in Caucasus.

A rising of water level in the downstream of Kura River were observed from 24 of April and became intensify on 1-3 of May as a result of strong rainfalls. The river level reached its maximum on 18-21 of May and the level continued to stay high until the end of June.

Observed precipitation amount in the Republic for AMJ during flood period (in comparison with the normal, in %)

Regions	April	May	June
Great Caucasus region (foothills)	149-194%	68-133%	50-119%
Small Caucuses	135-283%	111-179%	30-132%
Nakhchivan AR	110-188%	93-153%	11-16%
Steppe zones	191-443%	84-233%	10-111%

