## Study of gliadin-coding loci of the hybrid generation of durum wheat varieties of Azerbaijan

## Mr. Gulshen Poladova Huseyn

## Azebaijan Genetic Resources Institute

The allelic components of gliadin durum wheat studies in Azerbaijan, new allele component blocks of gliadin coding loci were identified, which had not been encountered before. Analyzes were carried out to determine grain quality of F6 hybrids obtained by crossing the local varieties Terter (*T.durum leukurum*) and Mirbashir 50 (*T.durum provensale*). The analyzes were carried out in accordance with thr state standards and according to the protocols of analysis. In the course of the research, it was found that varieties Tartar and Mirbashir 50 are carriers of 2 \* (Glu-A1b allel) subunits. Technological analyzes were carried out, the samples were selected for various morphological characteristics. It was found that among the hybrid generation there are samples with Glu-A1a and Glu-A1b alleles.

On the basis of glutenin electrophoregrams, allele of components of glutenin-coding loci, F6 samples of the hybrid generation, varieties Tyartyar x Mirbyashir50, it was found that they have null alleles at the Glt 1A locus. In F5 grains, of this hybrid generation, allelic blocks Clt 1B2 of the locus Glt 1B belonging to the parental forms were revealed, since, on the basis of HMG markers, it was revealed that both varieties Tyartyar and Mirbyashir50 possess the allele block Glt 1B2

As a result of the analysis carried out using the codominant marker UMN19, it was revealed that the varieties Tartar and Mirbashir 50 are carriers of 2 \* (Glu-A1b allel) BM subunits, which favorably affects the baking quality of flour and is estimated at 3 points.

Keywords: gliadin, HMS (high molecular subunits)