

## BUG'DOY (*TRITICUM AESTIVUM*) O'SIMLIGINI KASALLANTIRUVCHI FITOPOTOGEN VIRUSLAR

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**Annotatsiya** Bug'doy (*Triticum aestivum*) dunyoda eng muhim don ekinlaridan biri bo'lib, iqlim o'zgarishi va fitopatogenlarning ko'payishi hosildorlikni kamaytiradi. Kasallik va zararkunandalar bug'doy hosilining 25–30% gacha yo'qotilishiga sabab bo'ladi. Virusli kasalliklar eng xavfli omillardan bo'lib, bug'doyga shira, urug', chang, zamburug' va hasharotlar orqali yuqadi. Hozirda 66 dan ortiq virus aniqlangan.

**Kalit so'zlar:** bug'doy, virus, shtamm, symptom

Bug'doy (*Triticum aestivum*) — g'alladoshlar oilasiga mansub, dunyo bo'yicha eng ko'p yetishtiriladigan oziq-ovqat ekini. O'simlik oqsil (10–25%), kraxmal (60–64%) va mineral moddalarga boy. Biroq, iqlim o'zgarishi hamda biotik omillar, xususan virusli kasalliklar, hosildorlikka salbiy ta'sir ko'rsatmoqda. Bug'doyga 66 dan ortiq virus turlari yuqadi [1]. Eng xavflilari: **Barley yellow dwarf virus (BYDV)**, **Wheat streak mosaic virus (WSMV)**, **Wheat spindle streak mosaic virus (WSSMV)**, **Soil-borne wheat mosaic virus (SBWMV)** va **Wheat dwarf virus (WDV)** [2,3]. Barley Yellow Dwarf Virus (BYDV)— eng keng tarqalgan donli ekin virusi bo'lib, shira (Aphididae) orqali yuqadi [4–6]. Kasallik barglarning sarg'ayishi, o'sishning sustlashuvi va hosilning 30–80% gacha kamayishi bilan kechadi [7]. O'zbekistonda BYDV izolyatlari molekulyar aniqlanib, NCBI bazasiga kiritilgan [8,9]. Kurash choralari: shira sonini kamaytirish, ekish muddatini moslashtirish va chidamli navlarni tanlash [10]. Wheat Streak Mosaic Virus (WSMV) — *Potyviridae* oilasiga mansub bo'lib, *Aceria tosichella* oq akarisi orqali yuqadi. Barglarda sariq-yashil mozaika, o'sishning sekinlashuvi va qurish kuzatiladi [1,3,11]. Asosiy rezervuari yovvoyi o'simliklardir. Kurash choralari: akarilarni yo'qotish, begona o'tlarni tozalash, kech ekish va chidamli navlar ekish. Wheat Dwarf Virus (WDV)— *Geminiviridae* oilasiga mansub *Mastrevirus*, asosan *Psammotettix alienus* chigirtkasi orqali yuqadi [12,13]. Belgilari: o'sishning sustlashuvi, barg sarg'ayishi va hosilsiz boshloqlar. Nazorat: chigirtkalarni kamaytirish, don almashinuvi va chidamli navlardan foydalanish. Soil-borne Wheat Mosaic Virus (SBWMV) — *Polymyxa graminis* tuproq protozoyasi orqali yuqadi [14]. Belgilari: mozaika, shoxlanish, bo'y qisqarishi. Virus sovuq va nam sharoitda faol bo'lib, kistalarda uzoq saqlanadi. Eng samarali usul — chidamli navlarni yaratish va

sanitariya qoidalariga amal qilish [15]. Wheat Spindle Streak Mosaic Virus (WSSMV)—*Potyviriidae* oilasiga mansub *Bymovirus* bo‘lib, yosh barglarda sariq ip shaklidagi chiziqlar keltirib chiqaradi [16–18]. Virus *P. graminis* orqali yuqadi va yillar davomida tuproqda saqlanadi. Kurash choralari va samarali boshqaruv uchun: chidamli navlarni yaratish, vektorlarni nazorat qilish, ekish muddatlarini optimallashtirish hamda biotexnologik yondashuvlardan foydalanishga asoslanadi. Kelgusidagi tadqiqotlar virus-genom o‘zaro ta’siri va ekologik xavfsiz kurash usullarini ishlab chiqishga qaratilishi zarur.

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