

Supplementary Table S1. List of anti-IL-6 drugs (not tested in HNSCC)

Antibodies and Biologics Targeting IL-6 Signaling (not Tested in HNSCC)				
Agent	Mechanism	Trade name	Description	Approved for Clinical Application
Vobarilizumab (ALX-0061) [228,251]	❖ IL-6R blocking	-	nanobody (antibody fragment)	-
Sarilumab [228–230]	❖ IL-6R blocking	Kevzara	human monoclonal antibody	Rheumatoid arthritis
Satralizumab [231]	❖ IL-6R blocking	Enspryng	humanized monoclonal antibody	Neuromyelitis optica spectrum disorder (NMOSD)
Clazakizumab [232] (CSL300, ALD518 or BMS945429)	◊ IL-6 neutralization ◊ IL-6 neutralization	-	humanized monoclonal antibody	-
Olokizumab [154,252]	(and prevents binding to gp130)	Artlegia	human monoclonal antibody	Rheumatoid arthritis (only in Russia)
Sirukumab (CANTO136) [233]	◊ IL-6 neutralization	-	human monoclonal antibody	-
Olamkicept [174] (FE 999301, FE301, TJ301)	◆ gp130 blocking	-	recombinant human fusion protein (gp130 extracellular domains dimerized by the Fc part of human IgG1)	-
Soluble gp130 complete or miniaturized [25,173]	■ Downstream signaling inhibition	-	soluble gp130 (miniaturized, chimeric)	-
Elsilimomab (B-E8) [155]	◊ IL-6 neutralization	-	murine monoclonal antibody	-
B-R6 [155]	❖ IL-6R blocking	-	human monoclonal antibody	-
B-R3 [155]	◆ gp130 blocking	-	human monoclonal antibody	-
Gerilimzumab [165] (RYI 008)	◊ IL-6 neutralization	-	llama humanized antibody	-

				Rheumatoid arthritis
Baricitinib [234,253]	■ Downstream signaling inhibition	Olumiant	JAK inhibitor	Atopic dermatitis Covid-19 (in emergency use) [253] Myelofibrosis
Ruxolitinib [234,235]	■ Downstream signaling inhibition	Jakafi	JAK inhibitor	Polycythemia vera Steroid-refractory acute graft-versus-host disease Rheumatoid arthritis
Tofacitinib [234,236]	■ Downstream signaling inhibition	Xeljanz	JAK inhibitor	Psoriatic arthritis Ulcerative colitis

Other drugs targeting IL-6 signaling (not tested in HNSCC)

Agent	Mechanism	Trade name	Description	Approved for clinical application
Chloroquine [237–239]	* IL-6 production	Aralen	antimalarial drug	Malaria Extraintestinal amebiasis
Hydroxychloroquine [240,241]	* IL-6 production	Plaquenil	antimalarial drug	Discoid and systemic lupus erythematosus Rheumatoid arthritis
Artemisinin (and derivatives) [242,243]	* IL-6 production	Artesunate	antimalarial drug	Covid-19
LLL12B [244]	■ Downstream signaling inhibition	-	STAT3 inhibitor	-
Raloxifene [245,246]	■ Downstream signaling inhibition	Evista	selective estrogen receptor modulator	Postmenopausal osteoporosis
Madindoline-A (and synthetic analogues) [247,248]	◆ gp130 blocking	-	gp130 inhibitor	-
SC144 [169]	◆ gp130 blocking	-	gp130 inhibitor	-
LMT-28 [170]	◆ gp130 blocking	-	gp130 inhibitor	-

Quinacrine [249,254], in combination with platinum derivatives) [146]	■ Downstream signaling inhibition	Mepacrine, Atabrine	Quinacrine - antimalarial drug Platinum derivatives - chemotherapeutics	Giardiasis Rheumatoid arthritis Systemic lupus erythematosus Pneumothorax
Steroidal pregnanes (plant derived—glaucogenin C and hirundigenin) [250]	* IL-6 production	-	phytocompounds with anti-inflammatory activity	-

* IL-6 production, ♦ IL-6 neutralization, ♦ IL-6R blocking, ♦ gp130 blocking, ■ Downstream signaling inhibition