



Prof. Gökhan Akdemir, MD

Neurosurgery Department

ISU Medical Park Gaziosmanpaşa Hospital



Education and Expertise

1988- Çukurova University Faculty of Medicine

1996- Numune Training and Research Hospital, Brain and Nerve Surgery Specialist

2010- Hacettepe University Institute of Health Sciences

Experience

2023 İşü Medical Park Gaziosmanpaşa

2022- 2023 Acıbadem Health Group Bakırköy Hospital

2020-2022 Türkiye Hospital

2019 – 2020 University Of California, San Francisco (UCSF), San Francisco, California, USA

2018 – 2019 Acıbadem Health Group International Hospital

2015 – 2018 Memorial Health Group Şişli Hospital

2014-2015 University Of California, San Francisco (UCSF), San Francisco, California, USA



2013-2013 University Of California, San Francisco (UCSF), San Francisco, California, USA

2011-2015 Selçuk University Faculty of Medicine, Head of the Department of Brain and Nerve Surgery, Professor

2006-2011 Mustafa Kemal University Faculty of Medicine, Head of Department of Brain and Nerve Surgery

2002-2006 Numune Training and Research Hospital, Deputy Chief of Brain and Nerve Surgery Clinic

2001-2002 Sadi Konuk Training and Research Hospital, Chief of Brain and Nerve Surgery

1999-2001 Numune Training and Research Hospital, Brain and Nerve Surgery Clinic Chief Assistant

1998-1999 Diyarbakır Military Hospital Brain and Nerve Surgery Clinic Specialist, Lieutenant

1996-1998 Numune Training and Research Hospital, Brain and Nerve Surgery Clinic Chief Assistant

Courses and Certificates

2012 Yeditepe University, Istanbul Microsurgery - Prof. Dr. Gazi Yaşargil

2002 University of Florida, Gainesville, FL, USA Skull Base and Microanatomy -Prof. Dr. Albert L. Rhoton Jr.

1997 Krankenhaus Nordst Adt, Hannover, Germany Skull Base and Peripheral Nerve Surgery - Prof. Dr. Madjid Samii

1995 University of Illinois A T Chicago, Chicago, IL, USA Neurovascular Surgery, Stereotaxic Surgery - Prof. Dr. James I. Ausman and Prof. Dr. Manuel Dujovny

1994 Hacettepe University, Faculty of Medicine, Ankara



Professional Memberships

2015 European Skull Base Association

2015 Turkish Skull Base Association

2013 Turkish Neuro-Oncology Association Founding Member, 2009 Congress Of Neurological Surgeons, USA

1998 Turkish Neurology Association

1997 Turkish Neuroscience Association

1996 Turkish Neurosurgery Association

1988 Turkish Medical Association

AREAS OF INTEREST

- Neuro-oncology
- Brain tumors
- skull base tumors
- Pituitary tumors
- Spinal cord tumors
- Spinal tumors
- Peripheral nerve tumors
- Epilepsy



PUBLICATIONS

1. Alex J. Smith, Gokhan Akdemir, Meetu Wadhwa, Dan Song, Alan S. Verkman. Application of fluorescent dextrans to the brain surface under constant pressure reveals AQP4-independent solute uptake. *J Gen Physiol.* 2021 Aug 2; 153(8): doi: 10.1085/jgp.202112898
2. Elmaci I, Altinoz MA, Akdemir G, Sari R, Baskan O, Ozpinar A, Hacker E, Sav A. Neurosurgical and neuro-immunological management of IgG4-related hypertrophic sclerosing pachymeningitis. A literature survey and discussion of a unique index case. *Clin Neurol Neurosurg.* 2021 Jan;200:106342. doi: 10.1016/j.clineuro.2020.106342
3. Ozdemir H, Sumer S, Karabagli H, Akdemir G, Caliskaner AZ, Artac H. B cell aplasia and hypogammaglobulinemia associated with levetiracetam. *Ann Saudi Med.* 2018 Jan - Feb ; 38 (1) : 65 - 68 . doi : 10.5144/0256-4947.2018.09.01
4. Akdemir G, Kaymaz F, Gursoy-Özdemir Y, Akalan N, Akdemir ES. The time course changes in expression of aquaporin 4 and aquaporin 1 following global cerebral ischemic edema in rat. *Surg Neurol Int.* 2016 Jan 6;7:4. doi: 10.4103/2152-7806.173316.
5. Akdemir G, Ratelade J, Asavapanumas N, Verkman AS. Neuroprotective effect of aquaporin-4 deficiency in a mouse model of severe global cerebral ischemia produced by transient 4-vessel occlusion. *Neurosci Lett.* 2014 Jun 27;574:70-5. doi: 10.1016/j.neulet.2014.03.073. Epub 2014 Apr 6.
6. Koktekir E, Ceylan D, Tatarli N, Karabagli H, Recber F, Akdemir G. Accuracy



of fluoroscopically-assisted pedicle screw placement: analysis of 1,218 screws in 198 patients. *Spine J.* 2014 Aug;14(8):1702-8. doi:

10.1016/j.spinee.2014.03.044. 2014 Apr 4.

7. Koktekir E, Koktekir BE, Karabagli H, Gedik S, Akdemir G. Resolution of papilledema after endoscopic third ventriculostomy versus cerebrospinal fluid shunting in hydrocephalus: a comparative study. *J Neurosurg.* 2014 Jun;120(6):1465-70. doi: 10.3171/2014.2.JNS132002. 2014 Mar 28.

8. Gedik GK, Sari O, Koktekir E, Akdemir G. Fluorodeoxyglucose positron emission tomography computed tomography findings in a patient with cerebellar mutism after operation in posterior fossa. *Asian J Surg.* 2014 Mar 17. pii: S1015-9584(14)00021-9. doi: 10.1016/j.asjsur.2014.01.004.

9. Koktekir E, Koktekir BE, Recber F, Akdemir G. Lung adenocarcinoma metastasis to frontal sinus mimicking Pott's puffy tumor. *J Craniofac Surg.* 2013 Nov;24(6):e538-9. doi: 10.1097/SCS.0b013e318285d98a.

10. Katada R, Akdemir G, Asavapanumas N, Ratelade J, Zhang H, Verkman AS. Greatly improved survival and neuroprotection in aquaporin-4-knockout mice following global cerebral ischemia. *FASEB J.* 2014 Feb;28(2):705-14. doi: 10.1096/fj.13-231274. Epub 2013 No1.

11. Kaptan H, Koktekir E, Recber F, Akdemir G. Obstructive hydrocephalus caused by giant basilar artery aneurysm. *Neurosciences (Riyadh).* 2013 Apr;18(2):173-5.

12. Koktekir E, Tatarli N, Ceylan D, Koktekir BE, Akdemir G. Symptomatic pneumorrhachis. *J Neural Surg A Cent Eur Neurosurg.* 2014 Mar;75(2):140-5. doi: 10.1055/s-0032-1333123. Epub 2013 Feb 20. Review.

13. Berker D, Isik S, Aydin Y, Tutuncu Y, Akdemir G, Ozcan HN, Guler S. Thyrotropin secreting pituitary adenoma accompanying a silent somatotropinoma. *Turk Neurosurg.* 2011;21(3):403-7. doi: 10.5137/1019-5149.JTN.2642-09.2.

14. Akdemir G. Thoracic and lumbar intraforaminal ligaments. *J Neurosurg Spine.* 2010 Sep;13(3):351-5. doi: 10.3171/2010.3.SPINE09799.



- 15.Okay O, Daglioglu E, Akdemir G, Dalgic A, Uckun O, Atasoy S, Belen D. Lateral orbitotomy approach to orbital tumors: report of 10 cases. *Turk Neurosurg.* 2010 Apr; 20(2):167-72. doi: 10.5137/1019-5149.JTN.2620-09.2.
- 16.Yilmaz N, Akdemir G, Gezici AR, Basmaci M, Ergungor MF, Asalanturk Y, Beskonakli E, Ucar D. Electrophysiological and clinical assessment of response to surgery in carpal tunnel. *Int J Neurosci.* 2010 Apr; 120(4):261-4. doi: 10.3109/00207451003615748.
- 17.Serarslan Y, Melek IM, Sangün O, Akçora B, Akdemir G. Macrocephaly and bitemporal arachnoid cysts not associated with glutaric aciduria type I in a child. *Turk Neurosurg.* 2008 Apr; 18(2):172-6.
- 18.Ergungor F, Daglioglu E, Akdemir G, Okay O, Dalgic A, Hatipoglu G. Delayed chiasmal herniation after transsphenoidal removal of a pituitary adenoma - case report. *Neurol Neurochir Pol.* 2008 Jan- Feb; 42(1):60-3.
- 19.Serarslan Y, Melek IM, Duman T, Eraslan T, Akdemir G, Yalçın F. The cooccurrence of Chiari type 1 malformation with syringomyelia and total situs inversus. *Med Sci Monit.* 2007 Sep; 13(9):CS110-113.
- 20.Akdemir G, Dağlıoğlu E, Seçer M, Ergüngör MF. Hydatid cysts of the internal acoustic canal and jugular foramen. *J Clin Neurosci.* 2007 Apr; 14(4):394-6. Epub 2007 Jan 30.
- 21.Akdemir G, Ergüngör MF, Sezer M, Albayrak L, Dağlıoğlu E, Kilinç K. Therapeutic efficacy of intraventricular cyclosporine A and methylprednisolone on a global cerebral ischemia model in rats. *Neurol Res.* 2005 Dec; 27(8):827-34.
- 22.Akdemir G, Ergüngör F. Global cerebral ischemic findings in a woman who attempted to commit suicide by hanging. *Ulus Travma Acil Cerrahi Derg.* 2005 Jul; 11(3):250-3. Turkish.
- 23.Akdemir G, Tekdemir I, Altin L. Transethmoidal approach to the optic



canal: surgical and radiological microanatomy. *Surg Neurol*. 2004

Sep;62(3):268-74; discussion 274.

24.Akdemir G, Dağlioğlu E, Ergüngör MF. Dermoid lesion of the cavernous sinus: case report and review of the literature. *Neurosurg Rev*. 2004 Oct;27(4):294-8. Epub 2004 Apr 2. Review.

25.Ergün R, Akdemir G, Sen S, Taşçı A, Ergüngör F. Neuroprotective effects of propofol following global cerebral ischemia in rats. *Neurosurg Rev*.

2002 Mar;25(1-2):95-8.

26.Ergün R, Akdemir G, Gezici AR, Tezel K, Beskonakli E, Ergüngör F, Taskin Y. Surgical management of syringomyelia-Chiari complex. *Eur Spine J*. 2000 Dec;9(6):553-7.

27.Ergün R, Akdemir G, Gezici AR, Kara C, Ergüngör F. Craniocervical neurenteric cyst without associated abnormalities. *Pediatr Neurosurg*.

2000 Feb;32(2):95-9.

28.Ergün R, Okten AI, Akdemir G, Beskonakli E, Gürsoy F, Taskin Y. Cranio-cerebral erosion: delayed diagnosis and treatment. *Neurosurg Rev*. 1998;21(4):249-53.

29.Ergün R, Bostancı U, Akdemir G, Beşkonaklı E, Kaptanoğlu E, Gürsoy F, Taşkin Y. Prognostic value of serum neuron-specific enolase levels after head injury. *Neurol Res*. 1998 Jul 20(5): 418-20.

30.Akdemir G, Luer MS, Dujovny M, Misra M. Intraventricular atrial natriuretic peptide for acute intracranial hypertension. *Neurol Res*. 1997 Oct;19(5):515-20. Erratum in: *Neurol Res* 1997 Dec; 19(6):587.

31.Ergün R, Okten AI, Akdemir G, Beskonakli E. The value of MR imaging in prevention of unsuccessful back surgery. A case report. *Acta Radiol*. 1997 May;38(3):464-5.



32.Ergün R, Okten AI, Beşkonakli E, Akdemir G, Taşkin Y. Cervical laminar exostosis in multiple hereditary osteochondromatosis: anterior stabilization and fusion technique for preventing instability. Eur Spine J. 1997;6(4):267-9.

33.Başar H, Aydoğanlı L, Yüksel M, Başar M, Akdemir G, Kaptanoğlu E. The outcome of urological findings in operated tethered cord patients. Int Urol Nephrol. 1997;29(2):167-71.