

CLAIMS

1. A monoclonal antibody, or an epitope-binding fragment thereof, capable of immunospecifically binding to the phosphorylated residue 396 of human tau (**SEQ ID NO:33**) and specifically recognize hyper-phosphorylated tau from human Alzheimer's disease brains.
2. The monoclonal antibody according to claim 1 consisting of an intact antibody.
3. The monoclonal antibody or epitope-binding fragment thereof according to claim 1 comprising or consisting of an epitope-binding fragment selected from the group consisting of: an Fv fragment; a Fab fragment, Fab' fragment and F(ab)₂ fragment; and a single V_H variable domain or V_L variable domain.
4. The monoclonal antibody or epitope-binding fragment thereof according to any preceding claims, wherein the antibody is selected from the group consisting of antibodies of subtype IgG1, IgG2, IgG3 or IgG4.
5. The monoclonal antibody or epitope-binding fragment thereof according to any of the previous claims which is human or humanized.
6. A monoclonal antibody, or epitope-binding fragment thereof, according to any one of claims 1 to 5, comprising:
 - (a) a Light Chain CDR1 having the amino acid sequence of **SEQ ID NO:9**;
 - (b) a Light Chain CDR2 having the amino acid sequence of **SEQ ID NO:10**;
 - (c) a Light Chain CDR3 having the amino acid sequence of **SEQ ID NO:11**;
 - (d) a Heavy Chain CDR1 having the amino acid sequence of **SEQ ID NO:12**;
 - (e) a Heavy Chain CDR2 having the amino acid sequence of **SEQ ID NO:13**; and
 - (f) a Heavy Chain CDR3 having the amino acid sequence of **SEQ ID NO:14**.
7. The monoclonal antibody according to claim 6, comprising the heavy chain of **SEQ ID NO:16** and/or the light chain of **SEQ ID NO:15**.
8. A pharmaceutical composition comprising the monoclonal antibody or epitope-binding fragment thereof according to any of claims 1 to 7 and a pharmaceutical acceptable carrier.
9. A nucleic acid encoding a monoclonal antibody or epitope-binding fragment thereof according to any one of claims 1 to 7, or encoding a constituent chain thereof.

10. The monoclonal antibody, or epitope-binding fragment thereof, according to any one of claims 1 to 7, or the pharmaceutical composition according to claim 8, for use in therapy.
11. Use of the monoclonal antibody, or epitope-binding fragment thereof, according to any one of claims 1 to 7 or the pharmaceutical composition of claim 8, in the manufacture of a medicament for treating, diagnosing or imaging a tauopathy
12. Use of the monoclonal antibody, or epitope-binding fragment thereof according to any one of claims 1 to 7, or the pharmaceutical composition according to claim 8, in the manufacture of a medicament for treating a tauopathy selected from the group consisting of: Alzheimer's disease, Argyrophilic Grain Disease (AGD), Psychosis, particularly Psychosis due to AD or Psychosis in patients with AD, psychiatric symptoms of patients with Lewy body dementia, Progressive Supranuclear Palsy (PSP), Frontotemporal dementia (FTD or variants thereof), TBI (traumatic brain injury, acute or chronic), Corticobasal Degeneration (CBD), Picks Disease, Primary age-related tauopathy (PART), Neurofibrillary tangle-predominant senile dementia, Dementia pugilistica, Chronic traumatic encephalopathy, stroke, stroke recovery, neurodegeneration in relation to Parkinson's disease, Parkinsonism linked to chromosome, LYTIC-BODIG disease (Parkinson-dementia complex of Guam), Ganglioglioma and gangliocytoma, Meningioangiomatosis, Postencephalitic parkinsonism, Subacute sclerosing panencephalitis, Huntington's disease, lead encephalopathy, tuberous sclerosis, Hallervorden-Spatz disease and lipofuscinosis.