Glomerular Disease and Proteinuria

Glomerular diseases, including IgA nephropathy (IgAN), focal segmental glomerulosclerosis (FSGS), diabetic kidney disease (DKD) and Alport syndrome together are a leading cause of ESKD worldwide. 

- Proteinuria is a predictor of disease progression and ESKD in glomerular disease.
- Endothelin 1 (ET-1) expression is elevated in patients with glomerular disease.
- Endothelin A (ET(A)) receptor activation drives proteinuria, inflammation, and fibrosis.

The AFFINITY Study

The AFFINITY study (NCT04573920) is an ongoing global phase 2 open-label basket study of safety and efficacy of atrasentan in IgAN, FSGS, Alport syndrome and DKD patients at risk of progressive loss of kidney function.

Approximately 100 patients in the United States, Australia, South Korea, Spain, Italy and United Kingdom will be enrolled.

Atrasentan 0.75 mg QD

Key Eligibility Criteria:

- Proteinuria must be present in all patients - IgAN, FSGS, AS or albuminuria (DKD) from baseline at Week 12 for IgAN, AS and DKD, and at Week 24 post dose escalation for FSGS.

The primary endpoint is change in proteinuria (IgAN, FSGS, AS) or albuminuria (DKD) from baseline to Week 52 for IgAN and AS and DKD, and at Week 24 post dose escalation for FSGS.

Key exploratory measures include safety, tolerability and change in eGFR from baseline to Week 52.

Interim results from the IgAN cohort of the ongoing AFFINITY study demonstrate atrasentan is generally well-tolerated and results in a mean 54.7% reduction in proteinuria at Week 24 (N=19; ASN 2022, TH-PO497)

Atrasentan*

Blockade of the ET(A) receptor with atrasentan, a potent and selective ET(A) antagonist, represents a potential approach to reduce proteinuria and preserve kidney function in glomerular diseases.

- In preclinical studies, atrasentan attenuates mesangial cell activation, glomerular and tubulointerstitial injury, and reduces proteinuria associated with IgAN.

- Atrasentan has demonstrated clinically significant and sustained proteinuria reduction with an acceptable safety profile in over 5,100 patients with DKD.

* Atrasentan is an investigational drug that has not been approved by regulatory authorities. Efficacy and safety have not been established. There is no guarantee that it will become commercially available for the use(s) under investigation.