

Fibroblast Activation ImmunoPET for Detection of Fibrosis Activity

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The Invention

UW-Madison researchers have developed a novel, cross-species antibody to fibroblast activation protein (FAP). The researchers identified the antibody through screening of a phage display library. That antibody underwent modifications to humanize it. The researchers labeled the antibody with radionuclides for PET imaging and showed high specificity in labeling active fibrosis in animal models for lung fibrosis and various cancers. This antibody can detect early fibrotic activity in tissue which will be key in diagnosing fibrosis early. The inventors compared their labeled antibody to a labeled small molecule inhibitor/binder of FAP and showed that the small molecule pooled in the liver rather than getting to and staying in the lung. When they compared their antibody to another antibody reported as useful for imaging FAP, they saw a much more selective label of the fibrotic tissue in tumor models using their antibody.

Additional Information

For More Information About the Inventors

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Tech Fields

- Diagnostics & Biomarkers : Biomarkers
- · Drug Delivery: Other drug delivery technologies

For current licensing status, please contact Rafael Diaz at rdiaz@warf.org or 608-960-9847