

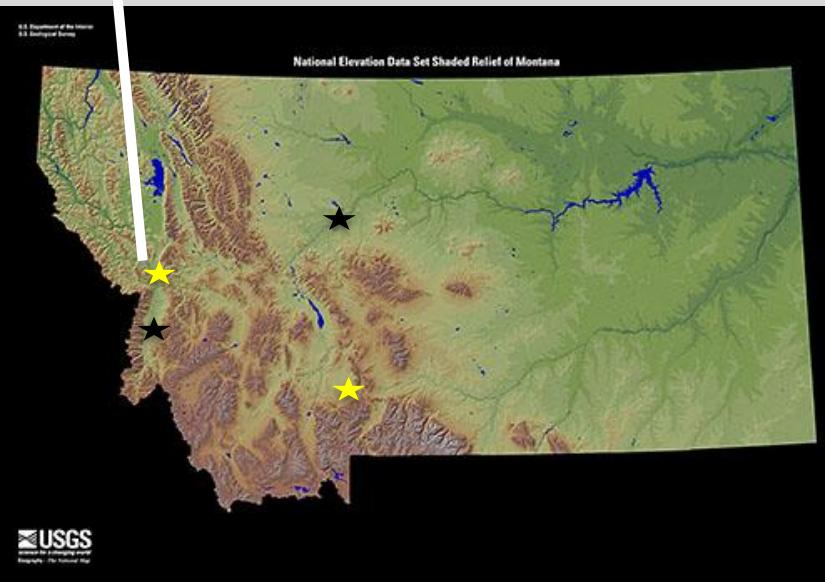
IDeA Program Institutions In Montana

University of Montana, Missoula

↑
**COBRE Center for Structural
& Functional Neuroscience**
IDeA Funding 2000 - 2009

**COBRE Center for Environmental
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IDeA Funding 2002 - Present

**COBRE Center for Biomolecular
Structure & Dynamics**
IDeA Funding 2011 - Present



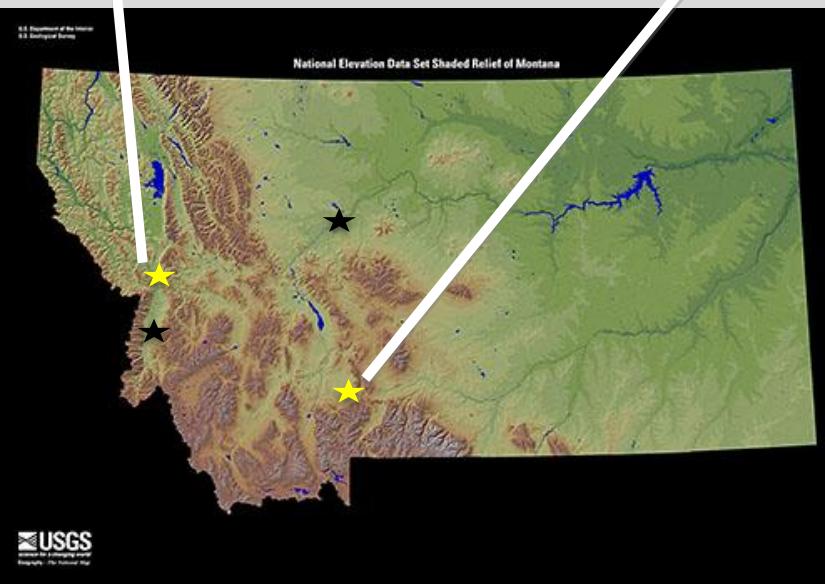
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Montana State University, Bozeman

COBRE Center for Zoonotic &
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COBRE Center for the Analysis of
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Montana INBRE
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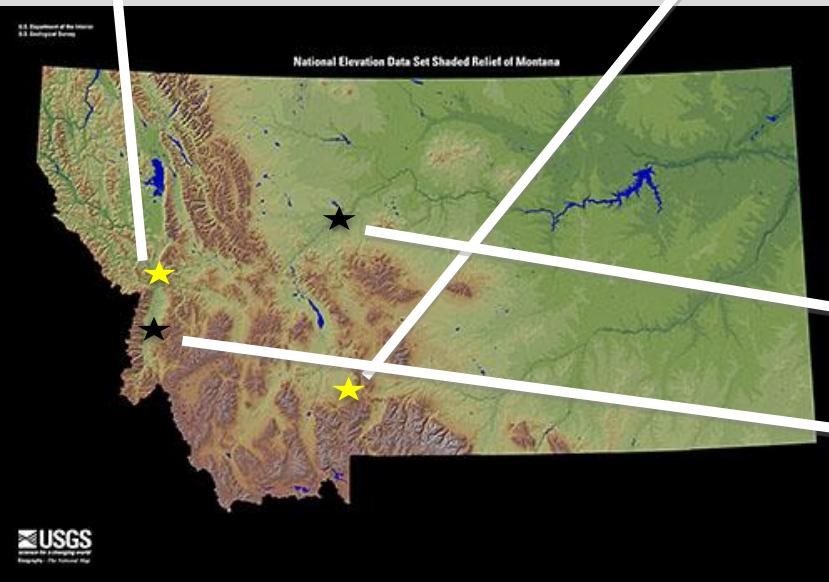
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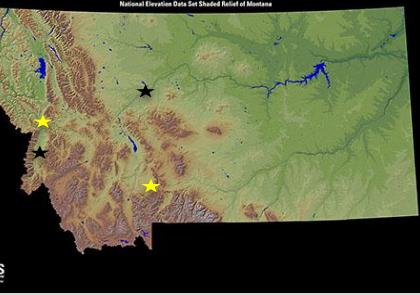
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IDeA Funding 2009 - Present

Montana INBRE
IDeA Funding 2002 - Present

Collaborative Research Institutions

McLaughlin Research Inst., Great Falls

NIAID Rocky Mountain Labs., Hamilton



COBRE Program Goals In Montana

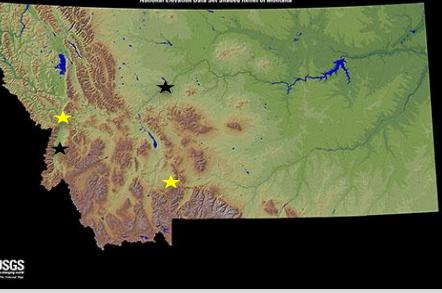
Primary Goal & Expectation:

To Increase the Quantity and Quality of Biomedical Research

Anticipated Benefits:

- Increase #'s of Research Competitive Faculty & Lab Groups
- Increase Grant Funding
- Increase Publications

Most Significant Impact:
Increase Critical Mass & Infrastructure



COBRE Program Goals In Montana

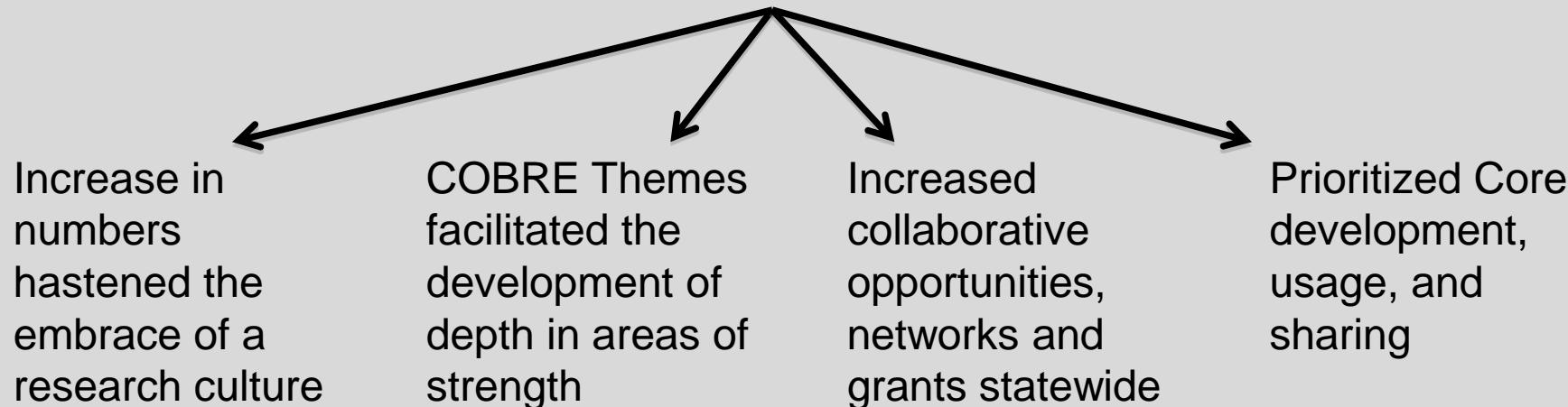
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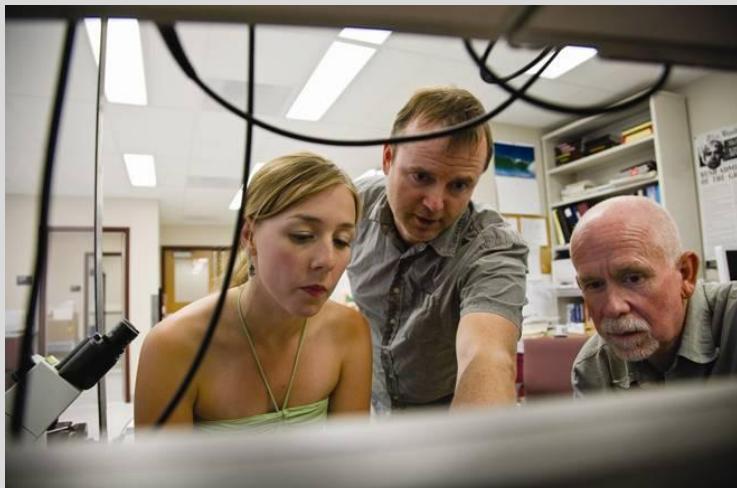
Increased Critical Mass

COBRE Program Impact In Montana

Anticipated Benefits:

- Increase #'s of Research Competitive Faculty & Lab Groups
- Increase Grant Funding
- Increase Publications

University of Montana COBRE Center for Structural & Functional Neuroscience



FY 1-10: **Hired 7 new faculty**

FY 5-10: **COBRE Funding: $\approx \$10,760,000$**
Leveraged non-COBRE Funding: $\approx \$40,547,000$

FY 1-5: **59 publications**
FY 6-10: **148 publication**

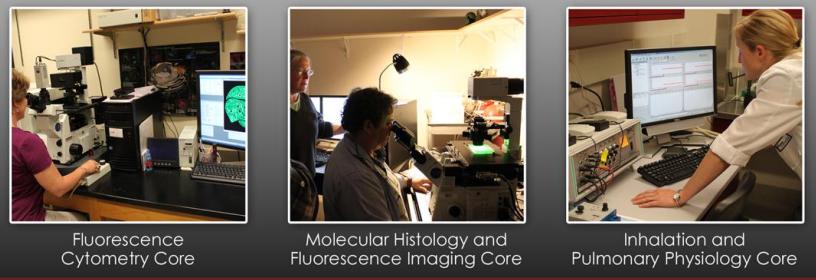
Increased Critical Mass

COBRE Program Impact In Montana

Anticipated Benefits:

- Increase #'s of Research Competitive Faculty & Lab Groups
- Increase Grant Funding
- Increase Publications

University of Montana COBRE Center for Environmental Health Sciences



Fluorescence
Cytometry Core

Molecular Histology and
Fluorescence Imaging Core

Inhalation and
Pulmonary Physiology Core

FY 1-10: Hired 6 new faculty

FY 5-10: COBRE Funding: $\approx \$10,769,313$

Leveraged non-COBRE Funding: $\approx \$24,131,997^*$

*Does not include non-CEHS leveraged funding

FY 1-5: 102 publications

FY 6-10: 176 publication

Increased Critical Mass

COBRE Program Impact In Montana

Anticipated Benefits:

- Increase #'s of Research Competitive Faculty & Lab Groups
- Increase Grant Funding
- Increase Publications

Montana State University COBRE Center for Zoonotic & Emerging Infectious Diseases



FY 1-10: Hired 7 new faculty

FY 4-9: COBRE Funding: $\approx \$10,354,000$
Leveraged non-COBRE Funding: $\approx \$52,085,000$

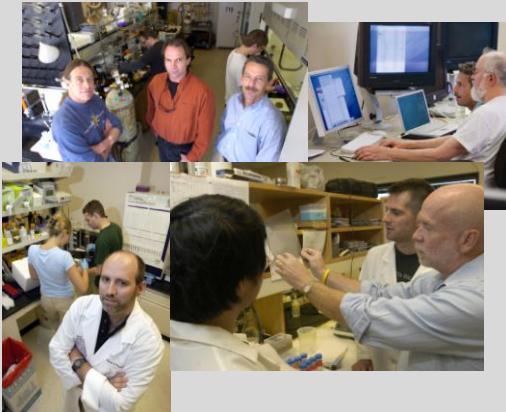
FY 1-2: 45 publications

FY 7-8: 75 publication

“Value Added” Impact of COBRE Centers

COBRE Program Impact In Montana

Serves as a Hub for Additional Growth



- Additional recruitments beyond “COBRE” hires

CSFN has grown from about 8 investigators to more than 40 statewide

- Development of New Space

Presence of CSFN and CEHS drove the construction of a new research building

- Strengthened Translational and Clinical Research Efforts with Regional Hospitals

Enhanced physician recruitment & Health Disparity research



“Value Added” Impact of COBRE Centers

COBRE Program Impact In Montana

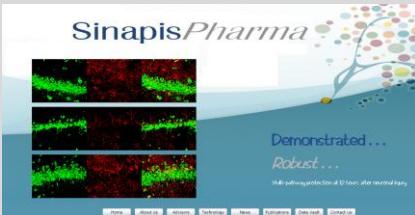
Enhanced Training Opportunities



- **New Graduate Programs**
*Toxicology
Neuroscience*
- **Summer Research Experiential Training programs**
CEHS (R25-funded) & CSFN Undergraduate Summer Research Program
- **Additional Mentors for UM Diversity Programs**
More opportunities for Native American students
- **New Undergraduate Programs**
Developing new minors in neuroscience and toxicology

“Value Added” Impact of COBRE Centers

Economic Development, Job and Business Creation



UM Tech Transfer –Brain Imaging Company, Rio Pharmaceuticals Launched

Wednesday, 01 December 2010 06:42



MISSOULA – Two new patents for brain imaging agents discovered at The University of Montana have produced a company called **Rio Pharmaceuticals**, which offers specifically designed molecules to image select biomarker proteins in the brain.

The new technology may help understand, diagnose and follow new therapies for neurodegenerative disorders such as Alzheimer's and Parkinson's diseases and neuropsychiatric conditions such as depression.

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COBRE Program Impact In Montana

- Increase in Critical Mass has led to new “high-tech” job creation

• New State Support

CSFN matching grant for economic development from the Montana Department of Commerce

• Greater Private Sector Collaborations

SBIR Grants, Shared use of Cores, on-campus incubator lab

• Spin-off Companies

5 New companies started out of CSFN and CEHS over past 5 years

“Value Added” Impact of COBRE Centers

COBRE Program Impact In Montana

Increased Outreach, Pipeline Training and Scientific Literacy for Biomedical Research



- **K-12 Outreach**

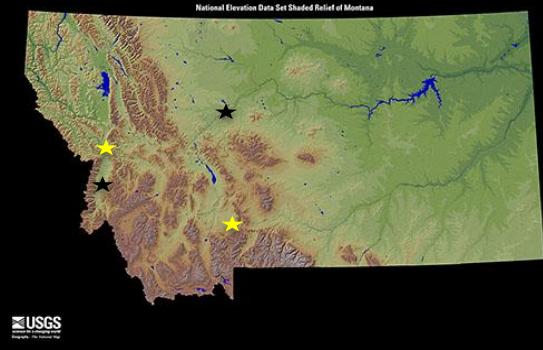
*CSFN R25-funded NINDS STEM
“Big Sky Brain Project”
CEHS SEPA NIEHS Project
“Clean Air, Healthy Homes”*

- **Community Based Research**

Rural populations, Native American populations, Unique environments

- **Public Lectures & Community Presentations to Increase Scientific Literacy**

- **Patient Education with Hospital Institutes**



COBRE Program Impact In Montana

Demonstrated Benefits

Increased #'s of Research
Competitive Faculty & Lab Groups

Increased Grant Funding

Increased Publications

“Value Added” Impact of COBRE Centers

Serves as a Hub for
Additional Growth

Enhances Training
Opportunities

Economic Development, Job
and Business Creation

Increases Outreach, Pipeline
Training and Scientific Literacy
for Biomedical Research