

**The University of Montana-Western
School of Education, Business, and Technology
Business Department**

Proposal for Associate of Applied Science in Equine Studies

Program Description

- 1. Briefly describe the proposed new program. Please indicate if it is an expansion of an existing program; a new program; cooperative effort with another institution, business, or industry; or an on-campus or off-campus program. Attach any formal agreements established for cooperative efforts.**

Purpose

The University of Montana-Western proposes offering an Associate of Applied Science in Equine Studies with two options: Equine Science, and Equine Business Management. The new freestanding program is not part of an existing program. The purpose of the programs is to provide the business and public sector community of the Northwestern Region and the State of Montana an equine studies program of excellent academic and administrative quality aimed at developing managers, professionals, and entrepreneurs in the equine industry.

Rationale: What Makes This Program Unique

The AAS degree in Equine Studies is geared towards developing professionals who can concurrently learn to integrate their academic training with hands-on projects and case studies in their desired field of emphasis. The program will involve cooperation with private enterprise for purposes of field experiences, internships, and experiential learning.

A distinguishing hallmark of the AAS degree is that students will be actively engaged in the local, statewide, national, and global equine and business communities.

The Exciting Path

The goal of the University of Montana-Western [UMW] is to give to graduates the tools and skills that will ensure a high level of equine science and business acumen as well as personal and professional satisfaction. The equine scientific and business knowledge, leadership and management skills will serve graduates for the remainder of their career. By following this rigorous and exciting path, good equine managers and professionals will achieve greater success.

- 2. Summarize a needs assessment conducted to justify the proposal. Please include how the assessment plan was developed or executed and the data derived from this effort.**

Needs Assessment

The horse industry is a highly diverse industry that supports a wide variety of activities in all regions of the country. It combines the primarily rural activities of breeding, training, maintaining, and riding horses with the more urban activities of operating racetracks; horse shows, cutting events, rodeo events, and public sales.

For years, horsemen and women have known that the American horse industry is a significant, economically diverse and productive business that deserves the attention and appreciation of government, media, and the public. However, they had no written documentation to support their claims.

After a yearlong study conducted by Barents Group of Washington, D.C. and commissioned by the American Horse Council Foundation, the horse industry has demonstrated that it is a major

contributor to the American economy. Following are some industry statistics from “The Economic Impact of the Horse Industry in the United States.”

Area horse producers will provide letters indicating a need for the Equine Science Program.

Although the AAS degree can be a terminal degree, The University of Montana-Western offers the AAS degree graduate the opportunity to obtain a Bachelor’s Degree, in the form of the Bachelor of Applied Science (BAS) degree that incorporates much of the coursework taken by students in completing the AAS. Much of the coursework would also be transferable into Western’s recently approved B.S. in Business, especially into the Tourism option.

Evidence in Support of Need

There are 6.9 million horses in the United States, including both commercial and recreational horses. Of those, 725,000 horses are involved in racing and racehorse breeding, while 1,974,000 and 2,970,000 are used in showing and recreation, respectively. The remainder, 1,262,800 are used in other activities, such as farm and ranch work, rodeo, polo, police work, etc.

There are 7.1 million Americans involved in the industry as horse owners, service providers, employees and volunteers. Of those, 3.6 million and 4.3 million of those participated in showing and recreation, respectively, with some overlap in cases of people who participate in both activities. Over 941,000 people participated in racing in either a professional or volunteer capacity. Approximately 1.9 million people own horses. In addition to the people actually involved in the industry, tens of millions more Americans participate as spectators.

The horse industry is a respected, broad based activity with multiple stakeholders including large numbers of recreational and show horse riders, and moderate-income track, show and stable employees and volunteers. The median income for all U.S. households is \$60,000. Fourteen percent of horse-owning households have incomes under \$25,000, 38% under \$50,000 and 64% under \$75,000.

The number of horses, participants in an activity, and the activity are listed below.

<u>Activity</u>	<u>Horses</u>	<u>Participants</u>
Racing	725,000	941,000
Showing	1,974,000	3,607,900
Recreation	2,970,000	4,346,100
Other	1,262,000	1,607,900
Total	6,931,000	7,062,500

This includes farm and ranch work, police work, rodeo, cutting, and polo. The sum of participants by activity does not equal the total number of participants because individuals could be counted in more than one activity.

Impact on the American Economy

The horse industry directly produces goods and services of \$25.3 billion and has a total impact of \$112.1 billion on the U.S. gross domestic product (GDP). Racing, showing, and recreation each contribute more than 25% to the total value of goods and services produced by the industry.

The industry’s contribution to the U.S. GDP is greater than the motion picture services, railroad transportation, furniture and fixtures, manufacturing, and tobacco product manufacturing industries. It is only slightly smaller than the apparel and other textile products manufacturing industries.

The industry pays a total of \$1.9 billion in taxes to federal, state, and local governments.

Of the 619,400 people directly employed by the industry, some are part-time and seasonal employees, which equates to 338,500 full-time equivalent jobs.

This is the standard way that the Bureau of Labor Statistics measures employment in the United States. The industry generates over 1.4 million FTE jobs across the U.S.

The total economic impact nationally is \$121.1 billion; 7.1 million Americans are involved in the industry, 1.4 million full-time jobs, 6.9 million horses, and \$1.9 billion is paid in taxes.

Broken down, the horse industry has a direct economic effect in the urban areas of \$2.8 billion and employs 45,800 employees. In the rural areas, the direct economic effect is \$22.5 billion and employs 292,700 FTE employees.

3. Explain how the program relates to the Role and Scope of the institution as established by the Board of Regents.

UMW Mission

Western's mission statement begins with the following: "The unique mission of the University of Montana-Western emphasizes experiential learning that combines theory and practice through projects and field experience." The proposed program fits this aspect of Western's mission well and interfaces excellently with Western's programs in Business, Tourism, Wildlands Interpretation, its rodeo and equestrian teams, and the surrounding ranching community.

AAS Degree in Equine Science and the Mission

The proposed AAS degree in Equine Studies is in congruence with the overall mission of UM-Western, which is to provide "hands-on, experiential learning and integrated thinking" by employing multiple learning methods through internships, field experience, and community involvement.

UMW has long offered Associate degrees that provide occupation-specific and related instruction that prepare students for employment. UMW also continues to meet immediate and short-term training needs of industry and business within its major service area. A broadly based program in equine studies will provide students the opportunity to develop, improve, or update their knowledge and skills.

4. Please state what effect, if any, the proposed program will have on the administrative structure of the institution. Also indicate the potential involvement of other departments, divisions, colleges, or schools.

Effects on UMW Administrative Structure

There will not be any impact on the administrative structure of the institution.

The program will be administered under the auspices of the School of Education, Business and Technology.

Because of the interdisciplinary nature of the program, other departments will provide supporting courses.

5. Describe the extent to which similar programs are offered in Montana, the Pacific Northwest, and the states bordering Montana. How similar are these programs to the one proposed?

Benchmarking

The following two and four year degrees in Equine Science/Equine Studies are offered in institutions in a region encompassing the following ten states: Washington, Oregon, Idaho, Nevada, Montana, Utah, Wyoming, North Dakota, South Dakota, and Colorado. The data was drawn from the College Examination Board's Index of Majors and Graduate degrees (1997), The

College Blue Book (2001), and the current web page of the Intercollegiate Horse Show Association. The mileage between each institution and The University of Montana-Western is included.

Associate Degree Programs

College of Southern Idaho (ID) -- 301 miles
Lamar Community College (CO) -- 1,009 miles
Laramie Community College (WY) -- 713 miles
Linn Benton Community College (OR) -- 793 miles
Northeastern Junior College (CO) -- 847 miles
Northwest College (WY) -- 313 miles

Baccalaureate Degree Programs

Brigham Young University (UT)-- 398 miles
Colorado State University (CO) --754 miles
Oregon State University (OR) -- 805 miles
Rocky Mountain College (MT) -- 262 miles

The two-year programs cited above are quite similar to the proposed UMW curriculum, both in course content and in program objectives. All of the proposed courses are either offered at the other two-year institutions under the same or similar name, or the content is assumed within other courses.

- 6. Please name any accrediting agency(ies) or learned society(ies) that would be concerned with the particular program herein proposed. How has this program been developed in accordance with criteria developed by said accrediting body(ies) or learned society(ies)?**

Accrediting Agencies

To the best of our knowledge, no such society or accrediting agency exists.

- 7. Prepare an outline of the proposed curriculum showing course titles and credits. Please include any plans for expansion of the program during its first three years.**

AAS IN EQUINE STUDIES

[72 credits required]

The Equine Studies Program provides the student a venue for his or her passion for horses. Students will be introduced to widely accepted training principles, and may receive a solid background in equine management principles. The two-option program gives students the latitude necessary to find their preferred place in the equine industry.

General Education—15 credits – Existing Courses

POLS 121 American Government (3)
COMS 101 Introduction to Computers (3)
ENG 101 Freshman Composition (3)
ENG 131 Oral Communication (3)
MATH 104 Mathematics for the Liberal Arts (3)

Other Required Courses—9 credits

BUS 210 Career Planning (2)
BUS 217 Business and Electronic Communications (3)
EQST 200 Internship (4) (New)

Equine Core—15 credits - New Courses

EQST 101	Introduction to Equine Studies (3)
EQST 102	Equine Selection and Judging-Western (3)
Or	
EQST 104	Equine Selection and Judging-English (3)
EQST 201	Principles of Equine Nutrition (3)
EQST 202	Equine Physiology (3)
EQST 203	Equine Reproduction (3)
EQST 204	Farm and Ranch Management (3)

Option (select one) – 30 credits:

- **Equine Science Option**
- **Equine Management Option**

Equine Science Option—30 credits

This option gives students a foundation in the sciences with an emphasis on hands-on skills associated with all aspects of equine services.

Science Requirements—15 credits

BIO 101	Introduction to Life Science (3)
BIO 152	Botany (4)
BIO 262	Microbiology (4)
GEOL 150	Environmental Geology (4)

Professional Electives—15 credits

ANTH 105	Introduction to Anthropology (3)
ART 380	Artist Blacksmithing (3)
BIO 151	Zoology (4)
BUS 202	Customer Service (3)
COMS 135	Microcomputer Applications (3)
ENVS 260	Wildlands Skills (2-8)
GEOL 101	Introduction to Geology (3)
GEOL 230	Geology of the American West (4)
HPE 231	First Aid and Safety (1)
PSY 100	General Psychology (3)
SPAN 101	Elementary Spanish (5)
All EQST	elective courses

Equine Management Option—30 credits

This option is designed for students interested in pursuing a career in the management of the equine industry. Students will be given an exposure to the business and economic realities of the equine industry

Business Requirements—18 credits

BUS 201	Entrepreneurship (3)
BUS 202	Customer Service (3)
BUS 241	Financial Accounting (3)
BUS 281	Business Law I (3)
BUS 347	Marketing Principles and E-Commerce (3)
ECON 252	Principles of Microeconomics (3)

Professional Electives—12 credits

ANTH 105	Introduction to Anthropology (3)
ART 380	Artist Blacksmithing (3)
BUS 242	Managerial Accounting (3)
BUS 282	Business Law II (3)
COMS 135	Microcomputer Applications (3)
COMS 234	Multimedia (3)

COMS 236	Advanced Microcomputer Applications (3)
ENVS 260	Wildlands Skills (2-4)
HPE 231	First Aid and Safety (1)
HTR 112	Fundamentals of Tourism (3)
HTR 143	Introduction to Leisure Services (3)
HTR 204	Leadership (3)
PSY 100	General Psychology (3)
SPAN 101	Elementary Spanish I (5)
All EQST	elective courses

COURSE DESCRIPTIONS:

EQST 101 INTRODUCTION TO EQUINE STUDIES (3)

Preview of the horse industry: evolution, breeds, skeletal structure, anatomy, physiology, genetics, health, uses, and economic impact.

EQST 102 EQUINE SELECTION AND JUDGING-WESTERN (3)

Covers basic confirmation and conformation faults and stresses form to function relationships. Judging in classes include: classes in halter, western pleasure, hunter (under saddle), reining, classes in trail, western riding, hunter hack, working hunter. Current standards of equine excellence for the selection and improvement of breeding stock, judging procedures, and conduct in the show ring are some of the topics to be discussed.

EQST 104 EQUINE SELECTION AND JUDGING-ENGLISH (3)

Fundamental concepts of correct structure and causes of lameness in the equine with an emphasis on English performance horses. Judging methods and systems, professional conduct at the horse show, and review of pertinent AHSA rules and procedures are some of the topics to be addressed.

EQST 200 INTERNSHIP (4)

A laboratory field experience providing a practical application of acquired knowledge and theory in a professional setting. Students serve under the guidance of professional personnel with the support of a university faculty supervisor. Students will complete a series of written periodic reports and a portfolio in the form of a final comprehensive report on their experience. Prereq: Sophomore standing, and c/i.

EQST 201—PRINCIPLES OF EQUINE NUTRITION (3)

Presents digestive anatomy and physiology in addition to basic nutrition. Topics include principles of digestion, nutrient requirements, and ration formulations.

EQST 202 PHYSIOLOGY OF EQUINE REPRODUCTION I (3)

Studies the fundamental anatomy and physiological function of the horse. Systems covered: circulatory, respiratory, urinary, nervous, genetic principles, animal selections covered: reproductive anatomy and physiology, stallion, mare and foal management, and artificial insemination.

EQST 203 PHYSIOLOGY OF EQUINE REPRODUCTION II (3)

Continues with the study of the fundamental anatomy and physiological function of the horse. Systems covered: circulatory, respiratory, urinary, nervous, genetic principles, animal selections covered: reproductive anatomy and physiology, stallion, mare and foal management, and artificial insemination.

EQST 204-FARM AND RANCH MANAGEMENT (3)

Covers all major aspects of operating a successful agricultural facility.

Faculty and Staff Requirements

- 1. Please indicate, by name and rank, current faculty who will be involved with the program proposed herein.**

John Xanthopoulos, Ph.D., Assoc. Professor of Education
Bill O'Connor, Ph.D., Professor of Business
Jim Sethi, Ph.D., Professor of Business
Cecil Jones, JD, Assoc. Professor of Business
Cheri Jimeno, Ph.D., Dean of Education, Business and Technology
Mark Rogstad, A.B.D., Asst. Professor of Industrial Technology
Glenda Elser, M.S., Asst. Professor of Business
John Bailey, M.R.E. Asst. Professor of Tourism and Recreation
Iola Else, M.Ed., Instructor of Business, Rodeo Coach
Shauna Basile, B.S., CPA, Instructor of Business
Andrea Easter-Pilcher, Ph.D., Environmental Science
Richard Clark, Ph.D., Director, Guide Institute
Barney Brienza, M.A., Professor of Art
John Hajduk, Ph. D., Assoc. Professor of History
Michael Francisconi, Ph.D., Assoc. Professor of Anthropology
Jack Kirkley, Ph.D., Professor of Biological Science
Steve Mock, Ph.D., Dean of Arts and Sciences, Professor of Chemistry
Gary Lundy, Ph.D., Professor of English
Jane Maddock, Ph.D., Professor of English
Diana Francis, Ph.D., Assistant Professor of English
Mark Adderley, Ph.D., Assistant Professor of English
Adrienne Adderley, M.A., Assistant Professor of English
Doug Daenzer, M.E., Assistant Professor of Business
Shaun Scott, B.S., Instructor of Business
Denise Carlson, M.Ed., Instructor of Business
Dave Kendall, M.S., Athletic Trainer
Kevin Engellant, M.Ed., Director of Microcomputer Center, Instructor of Computer Science,
Women's Head Basketball Coach
Sheila Roberts, Ph.D., Associate Professor of Geology
Rob Thomas, Ph.D., Professor of Geology
Dave Warner, M. Ed., Professor of Music/Spanish
Mark Krank, Ph.D., Professor of Psychology/Education
Rochelle Carpenter, M.Ed., Assistant Professor of Health and Physical Education
Bonnie Sheriff, M.S., Assistant Professor of Health and Physical Education
Bill Janus, Ph.D., Associate Professor of History
Marlene Stonelake, M.Ed., Programs Coordinator/Instructor, Business & Technology/Education

2. Please project the need for new faculty over the first five-year program. Include special qualifications or training. If present faculty are to conduct the new program, please explain how they will be relieved from present duties.

The program will be taught with existing faculty and adjunct faculty in the initial stages. Initial plans are for the teaching of five additional courses per year, either by adjuncts or by regular faculty with adjuncts teaching portions of the existing load of the regular faculty members. As the program grows, one new faculty member will be hired, possibly in the third year of the program. Expanding partnerships with the community will provide relief for existing faculty in the form of workshops and internships provided by partners.

Initial enrollment in the program is expected to be between 10 and 20 students based on informal surveys among current students. Increasing enrollment beyond 30 per year might require additional sections of courses to be taught and additional faculty to be hired.

3. Please explain the need and cost for support personnel or other required personnel expenditures.

There will be no additional need for support personnel with the addition of this program. Current staff time devoted to this degree will be proportional to the numbers of students enrolled in the degree.

Costs for 15 credits of adjunct teaching per year should be less than \$15,000 including salary and benefits. Adding a full-time faculty member, possibly in the third year of the program, would cost approximately \$50,000 per year, including salary and benefits.

Capital Outlay, Operating Expenditures, and Physical Facilities

1. Please summarize operating expenditure needs

The operating expenditures of the AAS would be proportional to that of Western's other students enrolled in its other programs. Extra costs associated with offering the program would be reduced by partners providing use of facilities or by the addition of course fees, where necessary.

2. Please evaluate library resources. Are they adequate for operation of the proposed program? If not, how will the library need to be strengthened during the next three years?

Currently, library resources in the Lucy Carson Library are inadequate to support an AAS degree program in Equine Studies. By examining the library collection at The University of Findlay, Ohio, which offers degrees in Equestrian Studies and Equine Business Management, we have a concept of what a core collection in equine science should be. Findlay holds over 100 books, audiovisuals, and video recordings in equine science published from 1991-2001.

According to The Bowker Annual 2001, the average hardcover book price is \$67.24/title in Agriculture and \$85.77/title in Science (2000 preliminary data). The average periodical price in Agriculture is \$102.57/title (2001) and the average VHS cassette price was \$72.31 (1998). Therefore, a start-up core collection for the AAS Equine Studies consisting of 50 books, five periodicals, and 10 videos would cost approximately \$5500. Each year Western's library allocates funds for acquisitions of holdings to serve Western's academic programs. If the AAS program in Equine Science is approved, part of the allocation to the School of Education, Business and Technology would go towards purchasing the necessary acquisitions. Thereafter, library funding will be proportional to the numbers of students enrolled in the program.

3. Please indicate special clinical, laboratory, and/or computer equipment that will be needed. List those pieces of equipment or computer hardware presently available in the department.

Library computer hardware, electronic resources for research, and facilities are adequate to meet the information access needs of the Equine Studies Program. Software specific to Equine Studies would need to be purchased as part of the core collection and ongoing development of the collection, since current software holdings (CD-ROM's) are inadequate.

4. Please describe facilities and space required for the proposed program. Are current facilities adequate for the program? If not, how does the institution propose to provide new facilities?

Current classroom facilities are adequate. Field experiences will make use of facilities provided by partners or provided using course or program fees to students.

EVALUATION OF PROPOSED PROGRAM

1. Please name faculty committees or councils and have reviewed and approved the program herein proposed.

This proposal has been reviewed and approved by The University of Montana-Western's Business and Technology Department; the academic and administrative officers of The University of Montana-Western; the campus Curriculum Committee; and the Faculty Senate.

2. If outside consultants have been employed, please list the names of these consultants, their current positions and titles. Append copies of their written reports (this is a requirement of new doctoral programs).

No external consultants were employed. Mr. William Kriegel, LaCense, MT; Lynn Harrington-Hirschy and Don Harrington, Hirschy and Harrington Ranches; Jim and Kate Kajin, Bloody Dick Outfitters; John and Phyllis Erb, Beaverhead Livestock Auction and Erb Ranches; and LeeAnn Demars, National Quarter Horse judge and producer have added input to the design of the program.

Conclusion

The returns of the proposed program are numerous and great for students, the university, and the equine community both in Montana and out of state. Accumulated knowledge, experience and exposure to new equine learning can fuel student career momentum. The new network of association with the wider equine community will help expand the scope of the equine business potential.