ҚАЗАҚСТАН РЕСПУБЛИКАСЫ БІЛІМ ЖӘНЕ ҒЫЛЫМ МИНИСТРЛІГІ
С.СЕЙФУЛЛИН атындағы ҚАЗАҚ АГРОТЕХНИКАЛЫҚ УНИВЕРСИТЕТІ

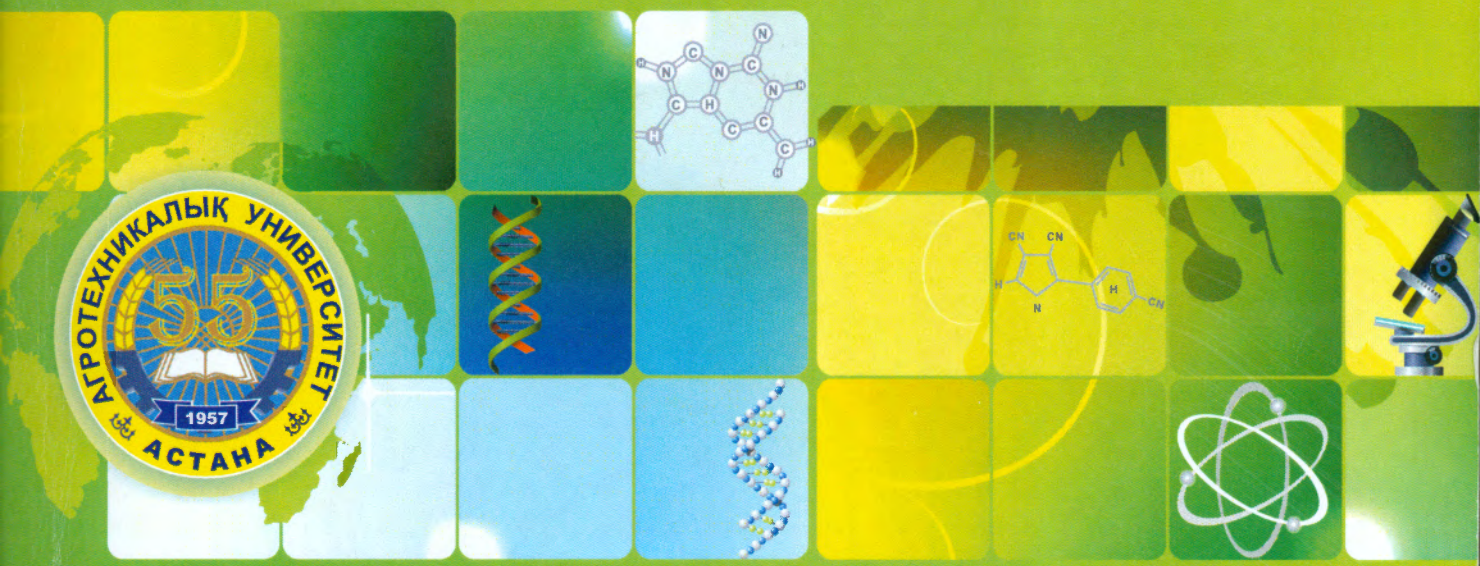
MINISTRY OF EDUCATIONAND SCIENCE OF THE REPUBLIC OFKAZAKHSTAN
S.Seifullin Kazakh Agro Technical University

УНИВЕРСИТЕТТІҢ 55 ЖЫЛДЫҒЫНА АРНАЛҒАН «ЗЕРТТЕУ УНИВЕРСИТЕТІ: ҒЫЛЫМ, БІЛІМ, ИННОВАЦИЯ СИНТЕЗІ» АТТЫ ХАЛЫҚАРАЛЫҚ ҒЫЛЫМИ-ПРАКТИКАЛЫҚ КОНФЕРЕНЦИЯ

МАТЕРИАЛДАРЫ

MATERIALS

International Scientific and Practical Conference dedicated to the 55th Anniversary of the University «Research University: Synthesis of Science, Education and Innovation»



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Университеттің 55 жылдығына арналған «Зерттеу университеті: ғылым, білім, инновация синтезі» атты Халықаралық ғылыми-практикалық конференцияның материалдарында университеттердің мәртебелерін өзгерту жағдайында Қазақстан жоғары оқу орындарындағы білім беру қызметінің өзекті мәселелері қарастырылған.

Жинақ ғылыми зерттеу институттары мен жоғары оқу орыны қызметкерлеріне, кәсіпорын басшылары мен мамандарына, докторанттар, магистранттар және студенттерден құралған кең ауқымды оқырмандарға арналған.

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BEING A RESEARCH-BASED UNIVERSITY: UNIVERSITY PUTRA MALAYSIA'S EXPERIENCE

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Malaysia aims to develop into a high-income country by the year 2020. To achieve this goal, the government of Malaysia is pressing to establish a society that is scientific, progressive,forward looking, and innovative. The economy of Malaysia must also be knowledge-based whereby research and development (R&D) is of prime importance. And to help to achieve Malaysia aspirations, universities are seen as crucial drivers or players.

Traditionally, universities are places of teaching, research, consultancies, and community services (*i.e.*, extension work). However, in keeping with Malaysia's aspirations, the Ministry of Higher Education (MOHE) have identified some universities toprioritizein research. Currently, there are five universities in Malaysia that have been given the status "Research University" (RU), and University Putra Malaysia (UPM) is one of them. These RUs have higher expectations to excel in research activities and invent knowledge through research and publications.

To achieve the RU status, certain criteria to show research excellence and commitment must be fulfilled by a university. Some of these criteria could include such as:

1. An average of two publications per year per lecturer
2. An average of about USD17,000 of research funding per lecturer per year
3. Appointment of several post-doctoral students (*e.g.*, 10 post doctoral students)
4. Number of lecturers who are Ph.D. holders to be increased (*e.g.*, 60% of lecturers are Ph.D. holders)
5. 50:50 ratio for the number of undergraduates to post-graduate students
6. The percentage of international students to be increased
7. Changes in management to facilitate the operations of the RU
8. Enhancing university-industry linkages or partnerships

Since obtaining the RU status, UPM have excelled in research. In the Ninth Malaysian Plan, for instance, UPM received the highest amount of research funding by the Ministry of Science, Technology and Innovation (MOSTI). UPM have received assistance for research via scholarships, seminars, study tours, and research equipment from various international agencies such as FAO (Food and Agriculture Organization), JICA (Japan International Cooperation Agency), WHO (World Health Organization), CIFOR (Centre for International Forestry Research), ACIAR (Australian Centre for International Agricultural Research), and IFS (International Foundation For Science). In 2011, UPM have5,546 number of publications in the following sources:

1. Citation-indexed (CI) journals 2,138
2. Non-CI journals 401
3. Books 112
4. Book chapters 395
5. Others 1,900

The cumulative impact factor for these publications is 2199.829, where the total impact factor in journals with impact factor greater than 3 is 132.UPM have won several awards in research, with 5 and 99 awards given by various international and national organizations, respectively. UPM havesigned several MOUs (Memorandum of Understanding), where 85 and 56 number of MOUs remain active with various international and national organizations, respectively.

UPM haveidentified six clusters of research areas or thrusts. These clusters are Agriculture, Food, Forestry and Environment, Health, Social Sciences, and Science, Technology and Engineering. From these six clusters, the key research areas in UPM are food crops, plantation crops, animal and

aquaculture production, bio-health, value-added bio-products, alternative renewable energy, tropical forest products, and halal products.

Future areas of concentration UPM research teams are moving towards are such as food security, tropical medicine, ICT, energy, water security, food safety, advanced and added values manufacturing, global warming, transportation and mobility, heritage food and culture, risk governance, childhood development and education, traditional knowledge, biodiversity and wildlife conservation, neuron degenerative disorder, chronic diseases and disabilities, and infectious diseases.

Nevertheless, being an RU, UPM continue to face several challenges. Some of these challenges include upgrading the supportive research infrastructure so that research works in UPM are supported by adequate and quality research labs and efficient research assistants. Greater numbers of multi-disciplinary research teams also need to encouraged, where team's members in a research team come from various faculties and universities. Another problem of concern in UPM is the increased workload on lecturers who have to balance their time for teaching, researching, and publishing, consultancy, and community services. One possibility is to allow some key researchers to have a reduced workload on teaching to concentrate more of their efforts and time on research. Lastly, UPM have to develop a strong coordination of all research efforts and results to ensure that there exist no duplication of work or disjointed research.

УДК[378+371]:658.53

ПРОЕКТИРОВАНИЕ СИСТЕМЫ ПОДГОТОВКИ МНОГОПРОФИЛЬНОГО СПЕЦИАЛИСТА ДЛЯ АГРАРНОГО СЕКТОРА ЭКОНОМИКИ

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Представлены результаты исследования по проектированию системы подготовки специалиста в условиях интеграции аграрного и педагогического вузов на примере объединенного университета Мичуринска-наукограда РФ. Обоснована многопрофильность, как ведущее требование к качеству подготовки специалистов для аграрного сектора экономики страны. Определены теоретические и методологические основы проектирования системы многопрофильного специалиста.

Многопрофильность, интеграция, аграрное и педагогическое образование

Основное требование к системе профессионального образования на современном этапе - ее соответствие структуре региональной экономики и формируемому ею рынку труда. При этом профессиональное образование должно обеспечивать опережающую подготовку кадров и опираться на стратегические планы развития экономики региона, с учетом задач по ее модернизации и инновационному развитию. К сожалению, современное региональное образование, как правило, слабо соответствует основным направлениям развития производства и сферы услуг в регионе. Соотнося данный ориентир со стратегией социально-экономического развития Тамбовской области, имеющей ярко выраженную агропродовольственную направленность, с направлениями деятельности Мичуринска-наукограда РФ в сфере АПК, в городе реализован проект присоединения трех разнопрофильных и разноуровневых образовательных учреждений к аграрному университету (рис.1). Цель проекта - повышение качества подготовки специалистов для аграрного сектора экономики и устойчивого развития сельских территорий региона.

Наибольший интерес и острую дискуссию в реализации проекта вызвал процесс объединения аграрного и педагогического вузов. Высказывалось мнение о традиционно сложившихся противоположных подходах к подготовке кадров в этих двух образовательных учреждениях, о невозможности синтезировать рациональное и иррациональное в содержании, технологиях обучения, направлениях научных и педагогических школ.