and uncertain period of apprenticeship become autonomous professors who negotiate the number of assistantships, thus replicating as professors what they experienced in the *Mittelbau*. For sound reasons, a 2002 reform was intended to oppose the negative consequences of the long period of apprenticeship and to increase the institutional control over professors. Merit-based salaries were thus introduced for all new professors. The resources they receive when they are recruited cover three to five years and are renegotiated according to their performance. However, most academics find the new income system less satisfactory than the former. On top of that, the reform creates quasi tenure-track positions for young scholars, who thus become more independent from senior professors.

It is too early to tell if these new positions will lead more easily to professorships as there are currently fewer than 800. This turnabout may discourage academics in the traditional *Mittelbau*, who still experience the control of professors but know that if they themselves become professors the long apprenticeship period may be undermined by an autonomous apprenticeship; professors would also face income conditions that are simultaneously less attractive.

Several European countries—including Germany, France, and Russia—retain a system that requires a second doctoral dissertation to be completed before a person can attain the highest academic rank, thus adding midcareer stress and maintaining an old arrangement that may have worked in the days before mass higher education but is now dysfunctional and widely criticized.

In France, the access to a first permanent position as maître de conférences occurs rather early compared with other countries

### Conclusion

We are not prepared to offer our mock ranking since it would be difficult to award a top rank to a single impaired academic career system; there is much competition. In fact, global trends indicate that the path to an academic career is becoming more difficult and less attractive. This pattern will not help the improvement of universities worldwide. For an academic system or a university to be successful, it requires an effective, fair, and transparent means of ensuring that an academic career is possible, that a professional and transparent process is attractive for scholars, and that an evaluation system is in place so that merit can be rewarded and appropriate selections made. Scholars entering the profession need access to a clear and achievable career path and assurance that high standards of performance provide career stability and success. Procedures must be rigorous and meritocratic, and institu-

tions must have confidence that only competence will be rewarded. At the same time, evaluation systems must not be overly complicated. Mobility within academic systems is desirable. The various aspects of academic performance—including teaching, research, and service to the university and society—must be assessed, although the balance among these elements may vary according to the mission of the specific institution. Career stability and a guarantee of academic freedom must be ensured. An American-style tenure system performs this role, but there are other arrangements as well. Evaluation systems, of course, need to take into account national traditions and realities. One thing is clear—universities and systems that score high on the dysfunctionality rankings will find it difficult to succeed in a competitive world.

# Degree Mills: The Impact on Students and Society

JUDITH S. EATON AND STAMENKA UVALIC-TRUMBIC

Judith S. Eaton is President of the Council for Higher Education Accreditation, Washington DC, USA. E-mail: eaton@chea.org and Stamenka Uvalic-Trumbic is Chief, Section for Reform, Innovation and Quality Assurance, Division of Higher Education, UNESCO, Paris, France. E-mail: s.uvalic-trumbic@unesco.org.

Degree mills are impeding the efforts to assure quality in higher education—a significant national issue for some time and now an international concern. In response, the US-based Council for Higher Education Accreditation (CHEA) recently joined with the United Nations Educational, Scientific and Cultural Organization (UNESCO) to bring together an informal group of higher education and quality assurance/accreditation leaders to focus on degree mills.

# THE TRAITS OF DEGREE MILLS

Degree mills are spurious or even fraudulent providers of higher education and training, offering degrees and certificates that may be considered bogus. At first glance, a degree mill frequently looks like a typical college or university, with publications (either print or electronic) displaying attractive campus facilities, logos that appear steeped in tradition, and a list of impressively credentialed faculty. Closer attention, however, often reveals that the so-called "campus" is just a post office box, the logo has been borrowed (and cleverly modified) from a well-known institution, and the list of faculty contains individuals who "may" be teaching at some point but are not in fact permanent professionals affiliated with the operation.

Without a single, commonly accepted, definition, most mills

share certain characteristics. Their degrees can be purchased. Little if any class attendance (onsite or online) is required. Few assignments are required of students, and graduation requirements are minimal. The decision to award a degree may involve disproportionate reliance on personal resumes or life experience, neither of which may be well documented. The degree mill may not have appropriate state licensure or authority to operate. The name of the operation may have been chosen to misleadingly resemble a well-known and highly regarded college or university. To reinforce their credibility, some mills misuse international organizations—such as UNESCO or the World Health Organization—falsely claiming accreditation by these bodies. Reliable evidence of quality, commonly through the achievement of accredited status from a recognized accreditor, may be lacking.

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Older site- and mail-based delivery methods of degree mills once meant that such providers could operate only regionally or nationally. Now, however, degree mills aggressively use Web-based delivery, enabling them to function internationally with great ease. The export of degree mills tends to be dominated by developed countries such as the United States, the United Kingdom, and Australia; and import is often dominated by unsuspecting and unwilling, mainly developing, countries.

How many degree mills are operating is hard to gauge, and all estimates of their numbers and scope of operation need to be treated with caution. The financial scope of the degree mill enterprise may range from at least one-half billion to billions of dollars annually.

## THE PERILS OF DEGREE MILLS

The harms caused by degree mills are so socially significant that all actors involved in higher education have a stake in discouraging the existence of such questionable providers. The stakeholders include not only students but also employers and government, as well as colleges and universities.

Students, whether deliberating seeking an easy path to a degree or genuine victims of misleading degree mill advertising, are endangered because these often expensive credentials are fraudulent and in many cases useless. Students and parents in developing countries, attracted by the opportunity of a foreign and more portable degree, are a particularly vulnerable group. All too frequently, the credentials cannot be used for obtaining employment or upgrading employment status. Credits from a degree mill do not readily transfer to a legiti-

mate institution. If a baccalaureate degree is proven to be fake, it cannot be used for entry to graduate school.

Employers are hurt when they unknowingly rely on makebelieve degrees as evidence of the competence of the employees they hire. An employee with such a degree is, at the very least, an embarrassment. At the extreme, such a person is a danger to others, especially when the bogus credential purports to affirm expertise in areas such as nursing or engineering. Lives are at stake.

Government suffers when millions of taxpayer dollars are used for student grants and loans to pay the tuition costs of a degree mill or when the government-as-employer provides tuition assistance to its employees who "attend" degree mills. Government (i.e., the taxpayer) is also obligated to sustain the cost of enforcing regulations to fight degree mills—such as the fraud investigations conducted over the years in the United States by the Federal Trade Commission and the General Accountability Office.

Colleges and universities are harmed because their legitimate efforts to provide quality higher education are undermined. When degree mills capture and minimally transform the names of reliable higher education providers for their own questionable use, they cause confusion and doubt among prospective students and the public. Public suspicion of degree mills spills over on legitimate providers of higher education, compromising the efforts of reliable institutions to sustain public trust and serve the public interest.

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#### **NATIONAL POLICIES**

Since the 1990s, a number of countries have taken significant action to contain degree mills: publishing lists of legitimate institutions, promulgating laws to prevent the establishment of degree mills, shutting down mills that have managed to establish themselves, and sustaining ongoing public information and awareness campaigns. At the recent meeting, mentioned earlier, of higher education and quality assurance leaders concerning degree mills, individuals from Nigeria, Australia, the United Kingdom, and the United States all spoke of sustaining several of these practices.

Other efforts include China's publication of lists of recognized foreign institutions and its requirement that foreign institutions establish partnerships with Chinese institutions to operate. In the United Kingdom, a system of alerts is in place to inform the public about degree mills, coupled with advice about whether government criteria for UK degree-awarding

powers and university title are met. In Nigeria, online degrees from unaccredited institutions are banned and employers are not supposed to accept fraudulent degrees. In Australia, the term "university" is protected.

# INTERNATIONAL ACTION

The recent focus on degree mills accompanies work on academic quality as higher education is increasingly internationalized. In Study Abroad, UNESCO published the CHEA Fact Sheet on degree mills and accreditation mills developed in 2003 as part of its alerts to this phenomenon. UNESCO and the Organization of Economic Cooperation and Development issued Guidelines for Quality Provision of Cross-Border Higher Education in 2005. The Guidelines suggest tasks for the various stakeholders in higher education—to protect quality for crossborder higher education provision to safeguard against degree mills. UNESCO has also recently launched a pilot, Portal on Higher Education Institutions, that provides international access to reliable countrywide lists of legitimate higher education providers (http://www.unesco.org/education/portal/hedinstitutions). This positive listing makes it clear that institutions that are not included may be suspect.

The international group brought together by CHEA and UNESCO is working on an international effective practices statement to address the problem of degree mills. The group is also exploring additional strategies such as whether a permanent international effort is needed to address rogue providers and the feasibility of an ongoing international campaign to raise public awareness.

This international effort is an ongoing need. Degree mills will continue to be a problem for students, employers, government, and higher education. They put a vital resource of our countries at risk—namely, our extensive, diverse, and highly effective higher education enterprise and the students who are served.

# When Criminals Control the Ministry of Education

GEORGE D. GOLLIN

George D. Gollin is professor of physics at the University of Illinois and a member of the Board of Directors of the Council for Higher Education Accreditation. Address: Department of Physics, University of Illinois at Urbana-Champaign, Urbana, IL 61801, USA. E-mail: g-gollin@uiuc.edu.

T he connection between education and personal economic advantage drives a global market for higher education. But much of the world cannot create additional university capacity

at a rate to match this demand. Diploma mills, businesses that sell bogus degrees to customers in search of easy credentials, comprise the dark response to these market forces. The recent demise of a sophisticated American diploma mill provides some insight into these abominations.

#### PAYING BRIBES TO GREAT EFFECT

In 2002, Richard Novak traveled to Washington DC to bribe a diplomat. Perhaps his experience as a car salesman in Arizona served him well: he convinced Abdulah Dunbar, the Liberian embassy's deputy chief of mission, to sell Liberian university accreditation to "St. Regis University" for \$2,250, considerably less than Dunbar's original demand for \$4,000. This first transaction opened a conduit through which Dixie and Steve Randock, the American owners of the St. Regis diploma mill, began channeling payments and incentives to Liberian officials.

The recent demise of a sophisticated American diploma mill provides some insight into these abominations.

At that time Liberia was still a year from the end of its bloody civil war. Mean life expectancy was 38 years, and infant mortality was 15 percent. Much of Liberia's infrastructure had been destroyed. Into this desperate landscape the Randocks pretended to insert three universities: St. Regis, Robertstown, and James Monroe. Their Web sites invited customers to contact Dunbar in Washington or Andrew Kronyanh at Liberia's embassy in Ghana, for verification of the schools' legitimacy. All three mills claimed to be in Monrovia; a doctored campus photograph showed a beautiful building in a pastoral setting. But this was really Blenheim Palace, birthplace of the very English Winston Churchill.

# HIJACKING THE MINISTRY OF EDUCATION

Dunbar was dismissed from the Liberian embassy in June 2003, complicating his task of vouching for St. Regis. The Randocks sent Novak and Dunbar to Africa two months later "with the specific intent to carry out the appropriate tasks placing [Dunbar] into the appropriate Liberian political office." The Randocks successfully achieved their ends: Dunbar was returned to Washington a few months later as the embassy's chief of mission.

By the end of 2003 the Randocks had come to control the Ministry of Education's list of recognized colleges and universities, as well as the content of the Liberian embassy's Web site. Through their officially sanctioned "National Board of Education," they sold Liberian accreditation directly to other diploma mills such as "Southern Pacific University" and "American Coastline University." Liberian officials under their