Perspectives on Occupational & Environmental Health Nursing

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PSY 596D: Spectrum of Professions Protecting and Promoting Worker Health
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OBJECTIVES:

To acquire knowledge about Occupational Environmental Health Nursing’s (OHN’s)

- Historical roots;
- Select theories, models & frameworks;
- Role in protecting/promoting worker health & safety;
- Range of settings & “clients”
- Type of work;
- Current research;
- Practice issues & challenges;
- Interactions with other OS&H disciplines.
OHN defined

Occupational and environmental health nursing is the specialty practice that focuses on preventive healthcare, health promotion, and health restoration within the context of a safe and healthy environment.

Includes:

- Prevention AEs from occupational & environmental hazards;
- Health promotion;
- Delivers OEHS programs and services.
- Is a specialty. Board Certification is available.
- Nursing decisions made within the scope of practice determined by state law.

(AAOHN, 2012)
Overview of OHNs

- Largest group of occupational health workers;
- Diverse roles, “clients”, scope of practice, & settings;
- Rooted in preventive, public health;
- First documented in late 19th c. (1880’s) in US;
- Evolved in early 20th c. with growth of industry;
- Current numbers
  - ≈ 19,000 practicing in US;
  - ≈ 12,000 board certified by ABOHN;
  - ≈ 5000 members of AAOHN;
- Changing lexicon reflects practice changes similar to those encountered by OE physicians
Nightingale’s strong environmental Philosophy:

“... the symptoms or the sufferings generally considered to be inevitable and incident to the disease are very often not symptoms of the disease at all, but of something quite different—of the want of fresh air, or of light, or of warmth, or of quiet, or of cleanliness, or of punctuality and care in the administration of diet, of each or of all of these...”

(Nightingale, 1898)
“Over broken asphalt, over dirty mattresses and heaps of refuse we went...There were two rooms and a family of seven not only lived here but shared their quarters with boarders...[I felt] ashamed of being a part of society that permitted such conditions to exist... What I had seen had shown me where my path lay.”
VERMONT MARBLE COMPANY

THE LARGEST MARBLE COMPANY IN THE WORLD

The earliest marble was quarried by the Humphrey brothers in 1836. They were followed by successive marble companies. In 1870 Redfield Proctor took over in receivership and brought the Vermont Marble Company to world prominence. Building contracts and work done in the Proctor shops include the US Supreme Court, Jefferson Memorial and the rotunda columns in the National Gallery of Art. The Company employee program established the first Industrial Nurses in 1895. Between 1890-1915 workers came from 23 countries and lived in many boarding houses and later in houses rented from the Company. Nationalities had social groups and aid societies. There were two Lutheran Churches, one Roman Catholic, one Greek Catholic and the Union Protestant Church.
Historical Roots:
First documented OH nurses in US
Growth in the 20th c.

Betty Moulder
- Employed by coal mining companies to provide care for employees and families

Ada Mayo Stewart
- Vermont Marble CO. in 1895

Factories employed nurses to:
- Combat spread of infectious diseases (e.g. TB);
- Care for workers injured on the job;
- Care for workers, families and the community;
- Address health problems resulting from Labor shortages during World War I, and
- Cut costs from new Worker’s Compensation legislation, MSHA, OSHA and other initiatives.

Thompson and Wachs, 2012
Select nursing or “borrowed” theories, models & frameworks

- Nightingale’s Environmental Philosophy (mid-late 1800’s)
  - Nursing paradigm: Environment, Person, Health, Nursing
- Maslow’s (1954) Hierarchy of Needs
- Leininger’s (1970) Cultural Care Diversity and Universality
- Watson’s (1979 +) Theory of Human Caring
- Pender’s (1982 +) Health Promotion Model
- Benner (1984+) From Novice to Expert
- Bandura’s (1994) Theory of Self-Efficacy
- Nursing Process: Assess, Diagnosis, Plan, Implement, Evaluate
- Levels of Prevention (1°; 2°; 3°)
- Samaras & Samaras (2009+) – Stakeholder Dissonance
• Diverse levels of preparation
  • LPN, diploma RN, ADN, BSN, MSN, DNP (other doctorates); various APRNs

• Varied roles, include:
  • Clinician (RN, APN),
  • Case manager,
  • Educator,
  • Consultant,
  • Researcher,
  • Manager,
  • Program planner,
  • Advocate,
  • Coordinator.

Requires professionalism, ethical conduct & adherence to legal requirements
Broad Range of Practice Settings

- From “trenches” of traditional heavy industry to high tech and global headquarters;
- OHNs are also found in:
  - universities,
  - unions,
  - hospitals,
  - OH clinics and centers,
  - insurance companies,
  - NGOs and governmental/military agencies.
# Survey of AAOHN Members

## N= 2123 (41%)

<table>
<thead>
<tr>
<th>Category</th>
<th>Details</th>
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<tbody>
<tr>
<td>Highly experienced</td>
<td>57% &gt; 16 years</td>
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<tr>
<td>Education</td>
<td>68% &gt; Baccalaureate</td>
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<tr>
<td>Certification</td>
<td>76% (COHN/COHN-S; case mgr.; safety; ergonomists, or NPs)</td>
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<tr>
<td>Work status</td>
<td>89% FT 85% Employees</td>
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<tr>
<td>Facility size</td>
<td>10% small employers &lt; 500 12% large employer &gt;50,000 13% work globally</td>
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Manufacturing (34%) Hospital/health (26%) Govt./military (10%)

Adapted from Burgel & Kennerly (2012)
Type of work in promoting worker H & S

- Population-based hazard & risk reduction
- Individually-based health promotion (RA, EAP referrals)
- Use & fit testing of PPE
- Pre-placement assessments, screening & surveillance
- Primary care – treatment and referrals
- Case management, rehabilitation & fitness to RTW
- Specialty services e.g. DOT examiner (NPs)
- Policy & management
- Emergency preparedness and response
- Regulatory compliance
- Documentation, record keeping, & confidentiality

Collaborate, communicate & consult with OSH team

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Current OHN & interdisciplinary research

- Meeting needs of aging workforce;
- Hazard reduction among less studied worker groups (e.g. migrant workers, taxi drivers);
- Worker productivity, including absenteeism & presenteeism;
- Effects of HP on worker health, productivity, & bottom line;
- Occupational health sciences (e.g. HF & E, toxicology, epi.);
- Common illnesses affecting working populations;
- Business and leadership issues.

Thompson & Wachs, 2012
Practice issues

- Globalization & resultant OEHS responsibilities & challenges;
- Stakeholder dissonance – ethical practice and the bottom line
- APRNs
- Next generation of OHNs, and other OH providers
- Interdisciplinary collaboration
- Workforce and workplace change and diversity
Personal Examples of Interdisciplinary Practice

- Industrial Setting
- Clinical (Academic OESH clinic)
- Policy & regulation –
  - Community/Worker Right to Know
  - OSHA standards
  - Human genome issues
- Nuclear workers
  - Beryllium Work:
    - Former DOE workers project
- Education
  - Training & train-the-trainers
- Inter-D Research – psych/tox. effects of industrial disasters
- Current HF & E and HEM activities
• The noble tradition of advocacy is central today as in reformist past; it is fundamental to Nursing and OHN codes of ethics;
• OHNs, their roles and responsibilities are almost as diverse as the populations they serve; in a state of flux, as is nursing itself;
• Nursing is interdisciplinary by nature and OHN is no different – drawing from other disciplines and theories – this can be a strength in interdisciplinary practice ...and a frustration;
• Increasingly OHN emphasizes EBP, participation in nursing research, & in interdisciplinary research opportunities;
• OHN has experienced some of the philosophical shifts (e.g. population/environmental/preventive) encountered by our OEHM counterparts.
These new full face respirators are brutal
Resources

• AAOHN Website:  http://www.aaohn.org/

• Standards of Practice for Occupational and Environmental Health Nursing:  
  http://www.healio.com/nursing/journals/aaohn/2012-3-60-3/%7Be87f06c3-3b10-4ec3-b223-00f87a689b1a%7D/standards-of-occupational-and-environmental-health-nursing

• APHA Occupational Health Section website:  
  https://www.apha.org/apha-communities/member-sections/occupational-health-and-safety