

FLORIDA DEPARTMENT OF HEALTH in Broward County

Healthy Environments
Healthy Communities
Healthy People



Environmental Health
Land Development Checklist

Healthy Environments, Healthy Communities, Healthy People

Environmental Health is one aspect of public health that is concerned with all forms of life, substances, forces and conditions surrounding human beings that may exert an influence on human health and well-being. The role of environmental health is the assessment, correction, control and prevention of environmental elements that have the potential to adversely affect human health. ⁽¹⁾

Health is possible only when the built environment is protected from pollutants, pathogens and physical hazards.

Healthy environments and healthy populations are mutually dependent. Planning decisions not only require prevention, but also active maintenance once a plan is in place, ensuring that environmental decay will not occur and that public health will not be negatively impacted.

Environmental health professionals have always played a crucial role in protecting public health by helping to prevent disease outbreaks, responding to environmental hazards and enforcing public health standards.⁽²⁾

History has shown a lack of focus on the improvement of the built environment or the environment where people live and work. The design of the built environment affects many things including: physical activity, obesity, air pollution, noise pollution, respiratory disease, injuries, chronic disease, and mental health.

Environmental health professionals are increasing their impact on public health by expanding their role to include the built environment in their assessments. As a result, community planners and developers are more receptive to receiving input from local health department officials and incorporating public health principles and recommendations into their development plans.





Recent surveys have shown that planners want more detailed comments on how to design healthy communities. The environment is changed by the project. New hazards may arise and old hazards may resolve.

The purpose of this document is to address environmental issues before they become environmental health hazards.

The following checklist offers specific criteria that will aid in the design of healthy, active communities and maintenance plans to keep the environment healthy once the project is complete.

Environmental Health Land Development Checklist

1. Water

- Water connection permits.
- Backflow prevention device for single service connection.
- Irrigation well permit, if applicable.
- Onsite Sewage Treatment and Disposal permit, if applicable.
- Public or private well on site.
- Well head protection, if applicable.
- Setback to underground fuel tanks.
- Does the project have the potential to release hazardous products or waste into the surface or groundwater? Mitigation plan in place?
- Erosion control plan.
- Is recycling or reuse of water and wastewater available?
- Does the landscaping include a water conservation action plan?

2. Garbage control

- Adequate pickup schedule to reduce sanitary nuisance and control rodents, birds and vector insects that can transmit organisms to people that cause disease such as plague.
- Dumpster cleaning and washing schedule to control odors and the accumulation of flies. The housefly is one of the main methods of transmission of enteric infections such as infantile diarrhea and dysentery.
- Dumpster to have proper lids, plug, dumpster pad and waste water collection line.

3. Grease traps for restaurants, if applicable

- Adequate collection and cleaning schedule to control rodents, roaches and flies.

4. Mosquito control

- Water feature (fountains) control to reduce the risk of mosquito breeding when inoperable. Mosquitoes are the vectors of dengue and yellow fever. Mosquitoes breed in stagnant rain water.
- Aeration/water pumps to keep water in lakes and canals moving in an effort to lower the risk of mosquito breeding.
- Mosquito control plan for vegetation.

5. Public drinking fountains, if applicable

- Maintain adequate water pressure above the mouth guard to prevent the spread of disease.
- Cleaning and sanitizing plan to reduce bio-growth and the spread of disease.

6. Environmental hazards

- Identify any environmental hazards such as exposure to toxic chemicals, fire hazards, explosions and hazardous waste spills that could occur as a result of this construction project.
- Identify any history of agricultural production or contamination with hazardous materials.
- Received confirmation of proper mitigation and clean-up of agricultural production or hazardous materials.
- List emergency services that would be provided in the event of a hazard.
- Describe means to control environmental hazards.

7. Light spillover

- What type of light spillover will the project produce?
- Once the project is complete, could the light spillover from the project be a safety hazard or impair views?
- What off site lighting or spillover can affect the project during and after construction?
- What proposed measures will be taken to control light and spillover impacts?

8. Rabies control

- All domestic pets living on the property should be required to have current vaccinations when applicable.
- Rabies control plan to include the prohibition of feeding wild animals, baiting wild animals and the county Animal Control recommendations.

9. Noise control

- What kind of noise will be generated as a result of this project?
- What measures will be taken to reduce or control the short and long term noise impacts?

10. Flooding

- Mitigation plan for low lying areas that retain water for more than 72 hours.
- Describe sources of water runoff and methods of collection and flow.
- Proposed measures to reduce or control the impact of surface, ground and runoff water.

11. Air pollution

- Will the project emit air pollutants?
- Is an emission permit required?
- What mitigation procedures are in place for dust emission?
- Will odors be generated and what plans are in place to reduce or control potential odors?
- Does the project include design for decreased vehicle usage to lower emissions?
- Is there a design for alternative transportation use?
- Any potential exposure to electromagnetic radiation? (cell phone towers)

12. Community sustainability

- Is a design in place for pedestrian and bike friendly streets and sidewalks?
- Is there adequate distance to shops, schools and bus routes to encourage walking and bike riding?
- Is there compliance with all ADA requirements?
- Are there adequate shade trees and lighting to encourage walking and bike riding any time of day or night?
- Are there adequate bus shelters?
- Are there adequate pedestrian crossings?
- Are there safe routes to schools?
- Are there open and safe spaces for children to play?
- Is there a plan for mix land use and a range of housing options?
- Will the community be involved in open discussions and decision making for this construction project?

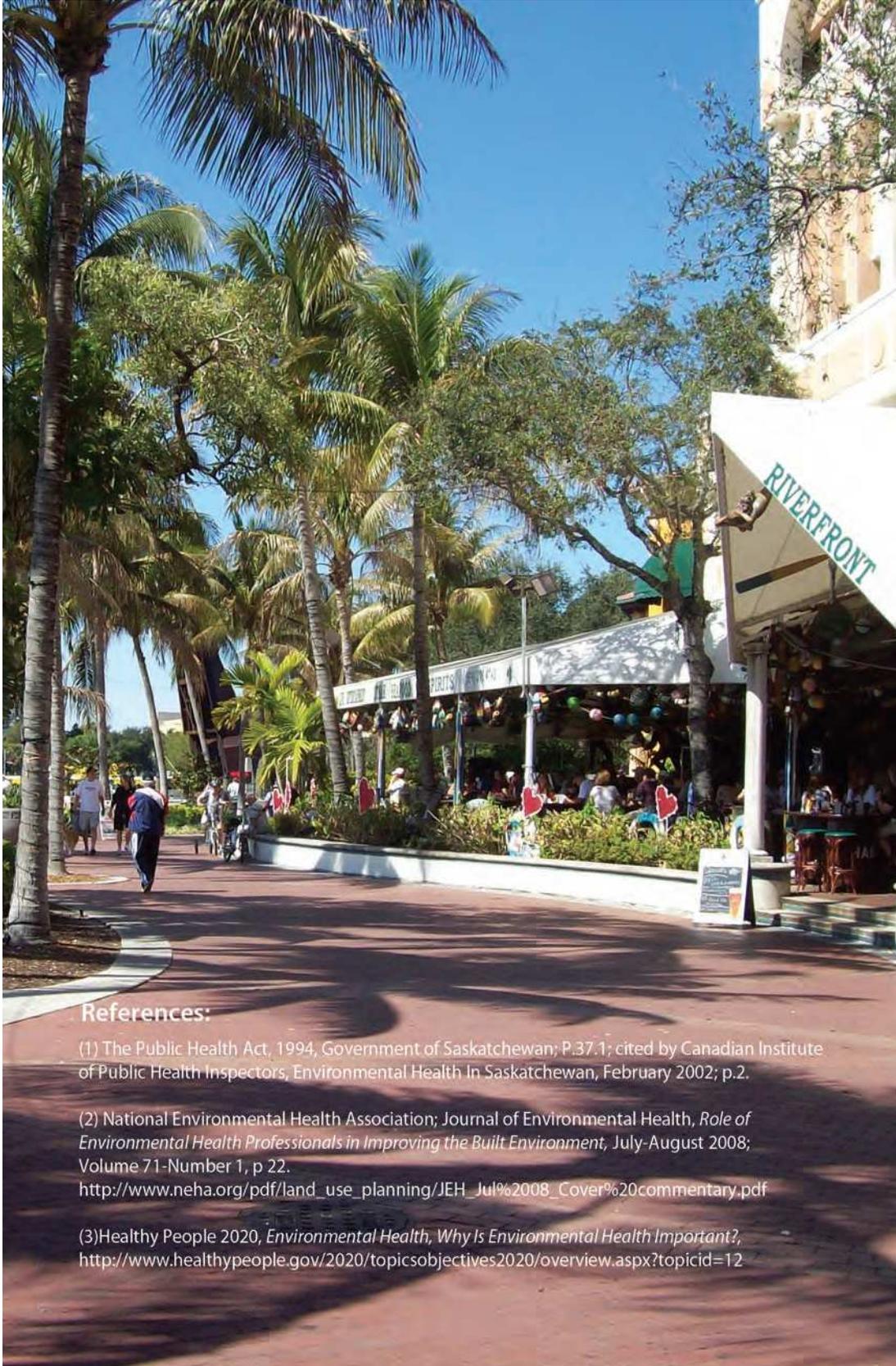
The World Health Organization (WHO) defines environment, as it relates to health, as “all the physical, chemical, and biological factors external to a person, and all the related behaviors. Health is only possible where resources are available to meet human needs and where the living and working environment is protected from life-threatening and health threatening pollutants, pathogens and physical hazards.”

The role of environmental health is to prevent or control disease and injury related to the interaction between people and their environment.

A healthy built environment is crucial to increasing the quality and longevity of life. Nearly 25% of all deaths worldwide can be contributed to environmental factors.⁽³⁾

There is a current need to connect environmental conditions to health impacts. It is the intent of this checklist to aid in making those connections and to inform planners, developers, elected officials, and the general public of the importance of considering environmental health in all projects related to the built environment.





References:

(1) The Public Health Act, 1994, Government of Saskatchewan; P.37.1; cited by Canadian Institute of Public Health Inspectors, *Environmental Health In Saskatchewan*, February 2002; p.2.

(2) National Environmental Health Association; *Journal of Environmental Health, Role of Environmental Health Professionals in Improving the Built Environment*, July-August 2008; Volume 71-Number 1, p 22.
http://www.neha.org/pdf/land_use_planning/JEH_Jul%2008_Cover%20commentary.pdf

(3) Healthy People 2020, *Environmental Health, Why Is Environmental Health Important?*,
<http://www.healthypeople.gov/2020/topicsobjectives2020/overview.aspx?topicid=12>

Environmental Health and Engineering Services at the Florida Department of Health in Broward County are designed to assure a safe and healthy environment for all residents and visitors. Services include monitoring, education and regulation activities that serve to prevent diseases of environmental origin, protect and improve the quality of life in Broward County and to help make Florida the healthiest State in the nation.



For more information please contact:
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