# Hillsborough County Fire Rescue STANDING ORDERS AND PROTOCOL

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Subject: STREPTOCOCCUS PNEUMONIAE

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## 1. Identification

a. An acute bacterial infection characterized typically by sudden onset with a shaking chill, fever, pleural pain, dyspnea, tachypnea, a productive cough of "rusty" sputum, and leukocytosis. The onset may be less abrupt in the elderly. In infants and young children fever, vomiting, and convulsions may be the initial manifestations. Pneumococcal pneumonia is an important cause of death in infants and the elderly.

# 2. Infectious Agents

a. The causative agent is <u>Streptococcus pneumoniae</u> accounts for approximately 90% of bacteria infections in the U.S.

## 3. Susceptibility

 Is increased by any process affecting the anatomic or physiologic integrity of the lower respiratory tract (e.g. influenza, pulmonary edema, aspiration, chronic lung disease, or exposure to irritants).

## 4. Mode of Transmission

 By droplet, direct oral contact, or indirectly through articles freshly soiled with sputum. Person-toperson transmission is common, but illness among casual contacts and attendants is infrequent.

## 5. Incubation Period

a. Not well determined: may be as short as 1 – 3 days.

## 6. Period of Communicability

 a. Presumably until nasopharyngeal discharges no longer contain virulent pneumococci in significant numbers. Penicillin will render patients with susceptible strains noninfectious within 24 – 48 hours.

## 7. Isolation

a. In hospitals, respiratory isolation may be warranted for patients with antibiotic-resistant infection who may be able to transmit it to other patients at high risk of pneumococcal disease.

## 8. Exposure Management

a. Droplet isolation and frequent hand washing

# 9. Vaccination

a. For most eligible patients, the 23-valent-pneumococcal vaccine need be given only once.

## 10. References

- a. Benenson, Abram S., ed., Control of Communicable Disease Manual 16<sup>th</sup> ed. 1995, American Public Health Assoc., Washington D.C.
- b. Professional Guide to Diseases, Sixth Edition 1998, Springhouse Corp., Springhouse, Penn.
- c. Control of Communicable Diseases Manual, Sixteenth Edition 1995, American Public Health Assoc., Washington, D.C.
- d. Communicable Disease Information, Seattle King County Department of Public Health web site, www.metroke.gov/health/prevent/hepa.htm
- e. Infectious Diseases, Armstrong & Cohen, Mosby 1999, Volumes 1 & 2.