

Pneumonia in older children

Pneumonia is an inflammation at the level of the respiratory bronchioles, alveolar spaces, and/or interstitium.

 For more information see *Pneumonia*.

Etiology of pneumonia in older children

- The most common agents in children over 5 years of age:
 - bacteria: *Streptococcus pneumoniae*, *Mycoplasma pneumoniae*, *Chlamydia pneumoniae*
- rare agents:
 - respiratory viruses: adenoviruses, influenza, parainfluenza, rhinovirus, RSV
 - bacteria: *Haemophilus influenzae*, *Mycobacterium tuberculosis*, vzácně *Staphylococcus aureus*, *Legionella pneumophila*^[1].

Clinical picture

 For more information see *Bacterial pneumonia*, *Atypical pneumonia*.

Therapy

- Empirical antibiotic treatment of community-acquired pneumonia in older children:
 - mild pneumonia - amoxicillin p.o. (50-90 mg / kg / day in 3 doses),
 - severe pneumonia - penicillin G i.v. (100-200,000 IU / kg / day or more in 4-6 doses), in case of allergy, cephalosporin III. generation i.v can be used instead.^[1]
- symptomatic treatment:
 - expectorants, mucolytics, antitussives for irritating dry cough
 - antipyretics
 - oxygen therapy for respiratory insufficiency
 - nebulization therapy
- regime measures:
 - adequate supply of fluids, calories, vitamins
 - respiratory rehabilitation
- Functional lung examination is indicated 6 weeks after the pneumonia has subsided^[2].

Comparison table for typical and atypical pneumonia

PARAMETER	TYPICAL PNEUMONIA	ATYPICAL PNEUMONIA
Basic characteristics	significant physical findings	poor physical findings
Agens	(extracellular) <i>Streptococcus pneumoniae</i> , <i>Haemophilus influenzae</i> <i>Haemophilus parainfluenzae</i> , <i>Staphylococcus aureus</i> , <i>Klebsiella pneumoniae</i> , <i>Escherichia coli</i> a <i>Pseudomonas aeruginosa</i>	(intra / paracellular) <i>Mycoplasma pneumoniae</i> , <i>Chlamydophila pneumoniae</i> , <i>Chlamydophila psittaci</i> , <i>Legionella pneumophila</i> <i>Coxiella burnetii</i> , viruses - RSV, influenza, <i>Pneumocystis carinii</i>
Boarding	sudden	slow
Extrapulmonary symptoms	infrequent	common - headache and muscle pain, vomiting, diarrhea
Fever	febrile	subfebrile
Cough	productive	dry, irritating
Heart rate	possibly tachycardia	normal
The patient looks	sick	calm, unaffected
Physically	crepitus, tubular respiration	isolated rales
X-ray	segmental/lobar opacities (alveolar involvement)	Reticulonodulation (interstitial involvement)
Sedimentation	high	slightly increased
Inflammatory parameters	high	slightly increased
Blood count	leukocytosis	lymphocytosis
Therapy	penicillins	macrolides

References

Related articles

- Pneumonia (pediatrics) • Infant pneumonia • Pneumonia
- Bacterial pneumonia • Atypical pneumonia • Abscessive pneumonia • Aspiration pneumonia
- X-ray examination in lower respiratory tract inflammation • Clinical evaluation of the severity of pneumonia

Citations

1. LEBL, J, J JANDA a P POHUNEK. *Praktická pediatrie : Obvyklé diagnostické a léčebné postupy na Pediatrické klinice v Motole*. 1. vydání. Galén, 2008. 189 s. s. 28. ISBN 978-80-7262-578-9.
2. BABÁČKOVÁ, P. *Zdravotnické noviny : Pneumonie* [online]. Mladá fronta a.s, ©2007. [cit. 2011-02-03]. <<https://zdravi.euro.cz/clanek/priloha-lekarske-listy/pneumonie-287447>>.