

# **Ključne poruke za liječnike u primarnoj zdravstvenoj zaštiti**

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## **Sve veća rezistencija na antibiotike predstavlja sadašnju i buduću prijetnju za djelotvornost antibiotika**

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Rezistencija na antibiotike predstavlja sve veći problem u javnom zdravstvu u Europi [1, 2].

Iako se broj infekcija uslijed bakterija rezistentnih na antibiotike povećava, spektar novih raspoloživih antibiotika nije obećavajući, te stoga predstavlja slabe izglede za dostupnost djelotvornog liječenja antibioticima u budućnosti [3, 4].

## **Rastući trend bakterija rezistentnih na antibiotike mogao bi se promijeniti, ukoliko se potakne ograničena i odgovarajuća primjena antibiotika u bolesnika u primarnoj zdravstvenoj skrbi.**

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Izlaganje antibioticima povezano je s pojavom rezistencije na antibiotike [5–8]. Na rezistenciju utječu cjelokupna potrošnja antibiotika u populaciji, kao i način primjene antibiotika [9, 10].

Iskustva iz pojedinih europskih država pokazuju da je smanjenje u propisivanju antibiotika za bolesnike na izvanbolničkom liječenju rezultiralo istovremenim smanjenje u rezistenciji na antibiotike [10–12].

Otpriklike 80% do 90% svih propisanih recepata za antibiotike je u primarnoj zdravstvenoj zaštiti, i to uglavnom za infekcije dišnih putova [9, 14, 15].

Postoje dokazi koji potvrđuju da antibiotici nisu potrebni u mnogim slučajevima infekcija dišnih putova [16–18], te da je imunosni sustav bolesnika sposoban boriti se protiv jednostavne infekcije.

U slučaju bolesnika s određenim faktorima rizika, poput primjerice, ozbiljnim eksacerbacijama kronične opstruktivne plućne bolesti (COPD) s povećanom proizvodnjom sputuma, potrebno je propisivanje antibiotika [19, 20].

Nepotrebno propisivanje antibiotika u primarnoj zdravstvenoj zaštiti složeni je fenomen, no uglavnom je povezan s faktorima, poput pogrešnog tumačenja simptoma, dijagnostičke nesigurnosti i opaženih očekivanja bolesnika [14, 21].

## Ključ je komunikacija s bolesnicima

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Ispitivanja su pokazala da zadovoljstvo bolesnika u okruženju primarne zdravstvene zaštite više ovisi o učinkovitijoj komunikaciji, nego o dobivanju recepta za antibiotik [22–24] te da propisivanje antibiotika za infekcije gornjih dišnih putova ne smanjuje stopu narednih posjeta bolesnika liječniku [25].

Profesionalan liječnički savjet utječe na percepciju i stav bolesnika prema njihovoj bolesti i prepoznatoj potrebi za primjenom antibiotika, posebice prilikom savjetovanja o tome što mogu očekivati tijekom bolesti, uključujući i realno vrijeme oporavka i strategije za samoupravljanje [26].

Nije potrebno da liječnici u primarnoj zdravstvenoj zaštiti izdvajaju više svog vremena za konzultacije koje uključuju savjetovanje o alternativama propisivanju antibiotika. Ispitivanja su pokazala da se takvo savjetovanje može pružiti unutar prosječnog vremena potrebnog za konzultacije, te da se pritom može zadržati visoki stupanj zadovoljstva bolesnika [14, 27, 28].

## Literatura:

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- [1] - European Antimicrobial Resistance Surveillance System. EARSS Annual Report 2007. Bilthoven, Netherlands: National Institute for Public Health and the Environment, 2008.
- [2] - Cars O, Högberg LD, Murray M, Nordberg O, Sivaraman S, Lundborg CS, So AD, Tomson G. Meeting the challenge of antibiotic resistance. *BMJ* 2008;337:a1438. doi: 10.1136/bmj.a1438.
- [3] - Finch R. Innovation - drugs and diagnostics. *J Antimicrob Chemother* 2007;60(Suppl 1):i79-82.
- [4] - Boucher HW, Talbot GH, Bradley JS, Edwards JE, Gilbert D, Rice LB, Scheld M, Spellberg B, Bartlett J. Bad bugs, no drugs: no ESKAPE! An update from the Infectious Diseases Society of America. *Clin Infect Dis* 2009;48(1):1-12.
- [5] - Malhotra-Kumar S, Lammens C, Coenen S, Van Herck K, Goossens H. Effect of azithromycin and clarithromycin therapy on pharyngeal carriage of macrolide-resistant streptococci in healthy volunteers: a randomised, double-blind, placebo-controlled study. *Lancet* 2007;369(9560):482-90.
- [6] - Donnan PT, Wei L, Steinke DT, Phillips G, Clarke R, Noone A, Sullivan FM,

- MacDonald TM, Davey PG. Presence of bacteriuria caused by trimethoprim resistant bacteria in patients prescribed antibiotics: multilevel model with practice and individual patient data. *BMJ* 2004;328(7451):1297-301.
- [7] - Hillier S, Roberts Z, Dunstan F, Butler C, Howard A, Palmer S. Prior antibiotics and risk of antibiotic-resistant community-acquired urinary tract infection: a case-control study. *J Antimicrob Chemother* 2007;60(1):92-9.
- [8] - London N, Nijsten R, Mertens P, v d Bogaard A, Stobberingh E. Effect of antibiotic therapy on the antibiotic resistance of faecal Escherichia coli in patients attending general practitioners. *J Antimicrob Chemother* 1994;34(2):239-46.
- [9] - Goossens H, Ferech M, Vander Stichele R, Elseviers M; ESAC Project Group. Outpatient antibiotic use in Europe and association with resistance: a cross-national database study. *Lancet* 2005;365(9459):579-87.
- [10] - Guillemot D, Carbon C, Balkau B, Geslin P, Lecoeur H, Vauzelle-Kervroëdan F, Bouvenot G, Eschwége E. Low dosage and long treatment duration of beta-lactam: risk factors for carriage of penicillin-resistant *Streptococcus pneumoniae*. *JAMA* 1998;279(5):365-70.
- [11] - Butler CC, Dunstan F, Heginbothom M, Mason B, Roberts Z, Hillier S, Howe R, Palmer S, Howard A. Containing antibiotic resistance: decreased antibiotic-resistant coliform urinary tract infections with reduction in antibiotic prescribing by general practices. *Br J Gen Pract* 2007;57(543):785-92.
- [12] - Goossens H, Coenen S, Costers M, De Corte S, De Sutter A, Gordts B, Laurier L, Struelens MJ. Achievements of the Belgian Antibiotic Policy Coordination Committee (BAPCOC). *Euro Surveill* 2008;13(46):pii=19036.
- [13] - Sabuncu E, David J, Bernède-Bauduin C, Pépin S, Leroy M, Boëlle PY, Watier L, Guillemot D. Significant reduction of antibiotic use in the community after a nationwide campaign in France, 2002-2007. *PLoS Med* 2009;6(6):e1000084.
- [14] - Cals JW, Butler CC, Hopstaken RM, Hood K, Dinant GJ. Effect of point of care testing for C reactive protein and training in communication skills on antibiotic use in lower respiratory tract infections: cluster randomised trial. *BMJ* 2009 May 5;338:b1374. doi: 10.1136/bmj.b1374.
- [15] - Wise R, Hart T, Cars O, Streulens M, Helmuth R, Huovinen P, Sprenger M.. Antimicrobial resistance. Is a major threat to public health. *BMJ* 1998;317(7159):609-10.
- [16] - Butler CC, Hood K, Verheij T, Little P, Melbye H, Nuttall J, Kelly MJ, Mölstad S, Godycki-Cwirko M, Almirall J, Torres A, Gillespie D, Rautakorpi U, Coenen S, Goossens H. Variation in antibiotic prescribing and its impact on recovery in patients with acute cough in primary care: prospective study in 13 countries. *BMJ* 2009;338:b2242.
- [17] - Smucny J, Fahey T, Becker L, Glazier R. Antibiotics for acute bronchitis. *Cochrane Database Syst Rev* 2004;(4):CD000245.
- [18] - Spurling GK, Del Mar CB, Dooley L, Foxlee R. Delayed antibiotics for respiratory infections. *Cochrane Database Syst Rev* 2007;(3):CD004417.
- [19] - Puhan MA, Vollenweider D, Latshang T, Steurer J, Steurer-Stey C. Exacerbations of chronic obstructive pulmonary disease: when are antibiotics indicated? A systematic review. *Respir Res* 2007 Apr 4;8:30.
- [20] - Puhan MA, Vollenweider D, Steurer J, Bossuyt PM, Ter Riet G. Where is the supporting evidence for treating mild to moderate chronic obstructive pulmonary disease exacerbations with antibiotics? A systematic review. *BMC Med*. 2008 Oct 10;6:28.
- [21] - Akkerman AE, Kuyvenhoven MM, Wouden JC van der, Verheij TJM.

- Determinants of antibiotic overprescribing in respiratory tract infections in general practice. *J Antimicrob Chemother* 2005;56(5):930-6.
- [22] - Butler CC, Rollnick S, Pill R, Maggs-Rapport F, Stott N. Understanding the culture of prescribing: qualitative study of general practitioners' and patients' perceptions of antibiotics for sore throats. *BMJ* 1998;317(7159):637-42.
- [23] - Kallestrup P, Bro F. Parents' beliefs and expectations when presenting with a febrile child at an out-of-hours general practice clinic. *Br J Gen Pract* 2003;53(486):43-4.
- [24] - Macfarlane J, Holmes W, Macfarlane R, Britten N. Influence of patients' expectations on antibiotic management of acute lower respiratory tract illness in general practice: questionnaire study. *BMJ* 1997;315(7117):1211-4.
- [25] - Li J, De A, Ketchum K, Fagnan LJ, Haxby DG, Thomas A. Antimicrobial prescribing for upper respiratory infections and its effect on return visits. *Fam Med* 2009;41(3):182-7.
- [26] - Rutten G, Van Eijk J, Beek M, Van der Velden H. Patient education about cough: effect on the consulting behaviour of general practice patients. *Br J Gen Pract* 1991; 41(348):289-92.
- [27] - Cals JWJ, Scheppers NAM, Hopstaken RM, Hood K, Dinant GJ, Goettsch H, Butler CC. Evidence based management of acute bronchitis; sustained competence of enhanced communication skills acquisition in general practice. *Patient Educ Couns* 2007;68(3):270-8.
- [28] - Welschen I, Kuyvenhoven MM, Hoes AW, Verheij TJM. Effectiveness of a multiple intervention to reduce antibiotic prescribing for respiratory tract symptoms in primary care: randomised controlled trial. *BMJ* 2004; 329(7463):431-3.