SCIENTIFIC LETTERS

A propos of a new case of shigellosis by a non-imported multiresistant strain

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Dear Editor,

The most common etiologic agents amongst infectious gastroenteritis in our setting include *Campylobacter* and *Salmonella* (1). Furthermore, enteritis by multi-resistant bacteria are increasingly uncommon in our milieu (2,3). The presence of *Shigella* strains with extended spectrum β -lactamases in Europe has been reported among refugee populations in Greece and Eastern Europe. In Spain, an autochthonous case of *S. sonnei* (4) was reported in 2011 and an additional imported case has been recently described (5). We herein report the first case of shigellosis by multi-resistant *S. flexneri* in a patient with no recent history of travelling to exotic countries.

Case report

The case was a 29-year-old male from Honduras who had last visited his homeland 12 months earlier, with no other trips abroad ever since. He visited the Emergency Room due to watery, bloody stools over seven times a day, continuous mesogastric abdominal pain refractory to conventional painkillers and dysthermia with chills and malaise for less than 24 hours, after eating spoiled chicken. The body temperature was 37.3 °C. Abdominal tenderness was found on palpation in the mesogastrium, right hypochondrium and left iliac fossa, which were in association with increased bowel sounds. Emergency blood tests revealed C-reactive protein at 133 mg/l, mild hyponatremia (131 mEq/l) and mild hypokalemia (3.1 meg/l). He was discharged with empiric antibiotic therapy (metronidazole 500 mg/8 h for seven days and azithromycin 500 mg/24 h for six days) due to his clinical stability and good oral tolerance. The symptoms resolved within a few days and follow-up after three weeks revealed a clinical improvement and a return to normal of ions and CRP. Microbiology testing for enteritis were negative, except for CTX-M-15-producing *S. flexneri*, which had *in-vitro* resistance cephalosporins (up to fourth generation compounds), ciprofloxacin and cotrimoxazole. Fosfomycin minimum inhibitory concentration (MIC) was 0.25 mg/l.

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References

- Sánchez-Capilla AD, Sorlózano-Puerto A, Rodríguez-Granger J, et al. Infectious etiology of diarrheas studied in a third-level hospital during a five-year period. Rev Esp Enferm Dig 2015;107:89-97.
- Guzmán-Martín JL, Navarro-Marí JM, Expósito-Ruiz M, et al. Nalidixic acid surrogate test for susceptibility to ciprofloxacin in Salmonella. Revisiting the question. J Med Microbiol 2018;67:965-7. DOI: 10.1099/jmm.0.000755
- Aparicio-Gómez JA, Herrera-Leon S, Gutiérrez-Fernández J. First description of the extended-spectrum beta-lactamase blaSHV-12 gene in a Salmonella monophasic Typhimurium strain isolated from acute gastroenteritis in a kidney transplant recipient in Southeast Spain. Rev Esp Enferm Dig 2017;109:391-2. DOI: 10.17235/reed.2017.4617/2016
- Seral C, Rojo-Bezares B, Garrido A, et al. Characterisation of a CTX-M-15-producing Shigella sonnei in a Spanish patient who has not travelled abroad. Enferm Infecc Microbiol Clin 2012;30:469-71. DOI: 10.1016/j. eimc.2011.11.015
- González Donapetry P, Pescador Martín P, Gómez-Gil Mira R, et al. Caso importado de infección por Shigella sonnei portadora de betalactamasa de espectro extendido CTX-M-15. Enferm Infecc Microbiol Clin 2019;37:139-43. DOI: 10.1016/j.eimc.2018.03.006