Caso clínico

Sildenafil in severe peripheral ischemia induced by terlipressin. A case report

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A female patient in the sixth decade of life developed renal failure secondary to gastrointestinal bleeding, which was non-responsive to conventional therapy. She was treated with terlipressin iv; showing improvement but developing, over the next few days, ischemia and necrosis of the toes in the lower extremities, simulating necrotizing vasculitis, without response to regular management. An alternative therapy, oral sildenafil 50 mg BID, was used, with a rapid reversal of the clinical picture. The vasodilator action of sildenafil is useful in cases of ischemia induced by some drugs. The objective this report is to warm about the utility of sildenafil in some potentially severe cases, like the one above.

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Sildenafil en isquemia periférica severa inducida por tarlipresina. Reporte de un caso

Una paciente de la sexta década de la vida desarrolló fallo renal secundario a hemorragia digestiva incontrolable, con datos de choque hipovolémico, por lo que fue tratada con tarlipresina iv, con lo que hubo mejoria, pero presentó isquemia y necrosis de los dedos en extremidades inferiores, simulando vasculitis necrotizante sin respuesta al manejo terapéutico habitual, por lo que se empleó como alternativa sildenafil oral 50 mg 2 veces al día, con reversión rápida de su cuadro clínico. La acción vasodilatadora del sildenafil demostró ser una opción útil en el presente caso y el objetivo de esta comunicación es alertar de la respuesta satisfactoria al sildenafil en casos de isquemia inducida por medicamentos, semejantes a lo que se presenta en la práctica médica.

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Discussion

Sen et al described a possible toxic effect of terlipressin related to its vasoconstrictor action. Terlipressin has been associated with peripheral ischaemia and vasculitis-like lesions, like the ones observed in this case. Sildenafil is a selective inhibitor of GMP-phosphodiesterase with an effect on microvascular and macrovascular circulation, approved for use in erectile dysfunction, pulmonary arterial hypertension, and recently described by Fries et al for use in Raynaud’s phenomenon in cases not showing a response to common vasodilator therapy. Kumana et al has informed of sildenafil use in the presence of ischemia and tissue necrosis, with improvement of three severe cases. The effect obtained from the use of sildenafil, due to vasodilatation, could be considered as an effective therapy in cases of ischemia secondary to terlipressin, like the case above, when some other vasodilator agents cannot be indicated due to deleterious effects like hypotension. Another beneficial effect of sildenafil could be an increase of renal arterial flow with improvement of renal function in acute renal failure; the latter should be investigated to a larger extent. Sildenafil opens the possibility of use in ischemia of another etiology, and should be the object of more study as an alternative drug or even as the first option, alone or associated to other vasodilators, in severe cases of ischemia.

References