中文題目:於一位 76 歲女性以全身皮疹與急性呼吸窘迫症候群表現的瀰漫性腺病毒感染 英文題目:Disseminated adenovirus infection presenting with generalized skin rash and acute respiratory distress syndrome in a 76-year-old woman

作 者:羅世豪<sup>1</sup> 謝孟娟<sup>2,3,4</sup> 王惠菁<sup>2,3,4</sup> 陳杏鈞<sup>2,3,4</sup> 徐慧君<sup>2,3,4</sup> 黃崇豪<sup>1,5</sup> 許超群<sup>1,2,3,6</sup> 蔡明儒<sup>1,2,3,6,7,\*</sup> 服務單位:高雄醫學大學附設醫院 <sup>1</sup>內科部 <sup>2</sup>胸腔內科 <sup>3</sup>重症醫學科 <sup>4</sup>護理部 <sup>5</sup>感染內科 高雄醫學大學醫學院 <sup>6</sup>醫學系<sup>7</sup>臨床醫學研究所

**Introduction:** Disseminated adenovirus infection is uncommonly seen in adults, and most reported cases are immunosuppressed patients, especially transplant recipients taking immunosuppressants. Herein, we report a 76-year-old woman with disseminated adenovirus infection presenting as generalized skin rash and acute respiratory distress syndrome (ARDS).

**Case Presentation**: A 76-year-old woman with a history of diabetes mellitus, hypertension, and chronic left hydronephrosis without complications had been hospitalized for left pleural empyema with Escherichia coli bacteremia about nine months previously, having good recovery after antibiotic treatment and decortication via video-assisted thoracoscopic surgery (VATS). She was hospitalized about a month prior to this admission for pneumonia with right pleural empyema. Both culture from urine and empyema yielded Escherichia coli, and blood culture yielded Bacteroides fragilis. After antibiotic treatment with ceftazidime and levofloxacin and decortication via VATS, she remained having low-grade fever and developed erythematous papular rash on both thighs, buttocks, and the abdominal wall. After receiving antibiotic treatment with piperacillin/tazobactam, followed by ciprofloxacin, she was discharged in stable clinical condition. However, her low-grade fever and generalized skin rash persisted after discharge, and was re-admitted five days later due to productive cough and dyspnea. She developed ARDS with respiratory failure and was intubated three days after re-admission. Some small pustules developed on the generalized papular rash. Her family reported that one of her daughter had similar skin rash, in a milder form, in the similar periods. Her serum was negative for IgG and IgM of herpes simplex virus or varicella zoster virus. Tests for the suspected immunocompromised status showed extremely low IgG, IgA, and IgM levels and negative result of human immunodeficiency virus (HIV) test. Although aggressive treatment with broad-spectrum antibiotics, acyclovir, and intravenous immunoglobulin (IVIG) was give, she died of septic shock and respiratory failure in the second hospital week. The virus isolation from her blood and the vesicular fluid both yielded adenovirus thereafter.

**Discussion**: Adenovirus infection in immunocompromised patients may cause severe mortality and morbidity. However, disseminated adenovirus infection with cutaneous manifestations and acute respiratory distress syndrome has been rarely reported, especially in adult patients. Our patient might have an unspecified immunocompromised status which made her prone to disseminated adenovirus infection. In summary, disseminated adenovirus infection should still be considered in patients having generalized papular skin rash with pustules, even in those without a history of specified immuno-deficient status.