Executive summary

Project title

To fill the service gap of chronic hepatitis C treatment in HIV-infected hemophilia patients in Hong Kong (Project code MSS 237PM)

Background and Objective

Chronic hepatitis C virus (HCV) infection and related complications has become major morbidity and mortality among HIV-infected haemophilia patients. Some of these patients had failed to respond, intolerant to or ineligible for interferon therapy. New direct-acting antivirals (DAA), which were not available in public hospitals at the time of grant application, were needed for these patients. The objective of the program was to use newer DAAs for the treatment of chronic HCV infection in HIV-infected haemophilia patients who had failed previous treatment, intolerant to or ineligible for interferon therapy.

Service provision

Patients were managed by a multidisciplinary team including HIV physician, GI specialist, pharmacists and nurses. Baseline clinical assessment, fibroscan and laboratory tests were performed. Counselling on the importance of drug adherence to attain treatment goal was offered. Before starting antiviral therapy, patients were instructed about the treatment schedule, potential adverse effects and drug-drug interaction issue. Treatment efficacy, safety and side effects were monitored.

Results

A total of 7 patients received DAA-based HCV treatment. Four patients had failed previous interferon therapy, while 1 and 2 patients were intolerant to or ineligible for interferon therapy, respectively. New DAAs including Sofosbuvir (SOF), Sofosbuvir/Ledipasvir (Harvoni), and Ombitasvir/Paritaprevir + Dasavuvir (Viekirapak) were prescribed to treat chronic HCV infection. The selection of regimen was based on latest recommendation by international guidelines(European Association for the Study of the Liver Recommendations on Treatment of Hepatitis C 2015). All patients had 100% self-reported drug adherence for both DAA and antiretroviral therapy (ART) during the program period.

HCV RNA levels were measured at baseline, 4 weeks, at treatment completion, 12 weeks & 24 weeks post-treatment. Five patients had achieved sustained virological response at week 12 (SVR12). One patient was still awaiting the result of the treatment endpoint but his HCV RNA level at treatment completion was undetectable. The last patient did not achieve SVR

but only had low level viraemia, 81 IU/ml at week 12 post-treatment. In general, DAAs were well tolerated by patients. No major adverse events or complications were reported. **Summary**

DAA-based HCV treatment was provided to 7 HIV-infected haemophilia patients in Queen Elizabeth Hospital who had failed previous treatment, intolerant to or ineligible for interferon therapy. Sustained virological response was achieved in 5 out of 6 patients (83%), thus HCV was eradicated. The remaining one patient was awaiting the treatment outcome though he already had undetectable HCV RNA at the time of treatment completion. All patients tolerated DAA well without major adverse events or complications.