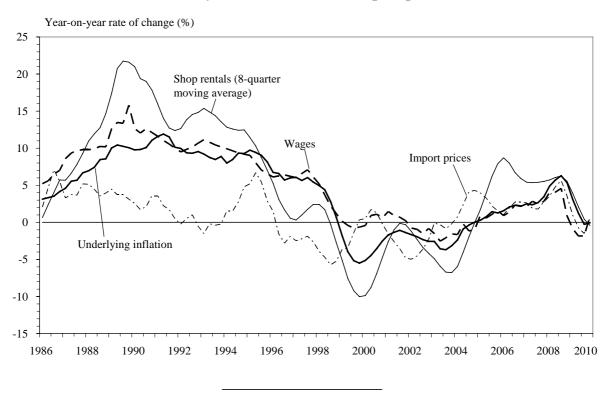
Box 6.1

To what extent is Hong Kong's CPI inflation explained by imported inflation?

There is some concern that the US dollar may weaken significantly in the medium to long run on its mounting debt and fragile nature of recovery. With the linked exchange rate system, a significant weakening of the US dollar may translate into higher import prices for Hong Kong, which could in turn add to consumer price inflation. As detailed in **Box 7.1** of the **2009 Economic Background and 2010 Prospects**, while exchange rate movement is a relevant factor influencing import prices, Hong Kong's import prices have been more stable and increased at a slower pace than in many other Asian economies since the inception of the linked exchange rate system in 1983. The purpose of this box article is to show to what extent Hong Kong's consumer price inflation is explained by imported inflation.

From *Chart 1*, imported inflation does not appear to be a major source of Hong Kong's CPI inflation. The results of Granger causality tests point to a statistically insignificant linkage from import prices to consumer price inflation, and suggests that Hong Kong's consumer price inflation is largely explained by domestic factors such as wages and rentals⁽¹⁾. Indeed, the surge in inflation in the 1990s was mainly a result of the buoyant economy, marked by sustained double-digit increases in both wages (10% per annum between 1987 and 1997) and rentals (11% per annum).

Chart 1: Hong Kong's consumer price inflation is driven more by domestic costs than import prices



(1) Granger causality tests were run using quarterly data from Q1 1983 to Q4 2009 and four lag periods. The results suggest significant Granger causality from wages and rentals to consumer price inflation both at the 1% level, but not from import prices.

Box 6.1 (Cont'd)

To gauge the extent to which underlying inflation is affected by imported sources, the contribution of imported inflation to underlying inflation can be crudely estimated on the basis of the import contents of food, consumer goods and fuel in the consumption basket and their respective rates of change over time, assuming a 100% pass-through from the import cost to the CPI level (Table 1).

Table 1: Decomposition of underlying CPI inflation into domestic and import sources

		Estimated % share of retained imports	Contribution to underlying inflation from:			
	Underlying	of food and consumer goods in	<u>Imported sources</u>		Domestic	
	CPI inflation	private consumption expenditure	Food and consumer goods^	Fuel@	Combined	sources#
	(%)	(%)	(% point)	(% point)	(% point)	(% point)
2000	-3.9	20.9	-0.5	0.1	-0.4	-3.6
2001	-1.4	21.2	-0.3	0.0	-0.3	-1.1
2002	-2.1	21.3	-0.7	0.0	-0.8	-1.4
2003	-3.2	22.0	0.1	0.1	0.1	-3.4
2004	-0.9	22.2	0.4	0.1	0.5	-1.4
2005	0.9	22.2	0.5	0.1	0.6	0.3
2006	2.0	21.4	0.2	0.1	0.2	1.8
2007	2.8	21.3	0.9	0.0	0.8	1.9
2008	5.6	22.6	1.2	0.2	1.4	4.2
2009	1.0	21.6	0.0	-0.3	-0.2	1.2
Annual average:						
Before crisis (08/03)	2.1	21.8	0.6	0.1	0.7	1.3
Past 5 years (09/04)	2.4	21.9	0.6	0.0	0.6	1.9
Past 10 years (09/99)	0.0	21.5	0.2	0.0	0.2	-0.2
Past 19 years (09/90)	3.0	22.9	0.2	0.1	0.2	2.8

The contribution is crudely estimated by multiplying the rates of change of imported prices of food and consumer goods (weighted by the respective shares of food and consumer goods in the trade value of retained imports for local use in the base period) by the import content as proxied by the share of retained imports of food and consumer goods in private consumption expenditure in the base period.

Estimates for years before 1990 are not available.

Over the past ten years from 2000 to 2009, imported inflation contributed roughly around 0.2 percentage point to Hong Kong's underlying CPI inflation, assuming that import price changes had been fully reflected in consumer prices. Except for 2007 and 2008 when Hong Kong was affected by a significant acceleration in food-led inflation caused by the global wide surge in food prices, imported inflation was rarely a key source of Hong Kong's inflation. In fact, the majority of contribution to consumer price inflation has for most of the time come from sources other than the imported components, i.e. the domestic components. In particular, for the past 19 years from 1990 to 2009, the average contribution of imported inflation to overall consumer price inflation is merely 0.2 percentage point out of the trend CPI inflation of around 3%.

From the observation that Hong Kong's import prices have fared better than many Asian economies both in terms of stability and rate of increase despite the US dollar's rough ride over the past 26 years, and given the small contribution of imported inflation to underlying inflation, unless the US dollar were to depreciate drastically, the risk posed to Hong Kong's CPI inflation should not be that significant in the near term.

^(@) Actual figures extracted directly from fuel-components in the CPI series. Fuel-components include motor fuel, LPG and towngas.

The contribution by domestic sources is derived as residual.