

Maximum hourly average concentrations of nitrogen dioxide and ozone

- Under conditions typically resulting in the formation of photochemical smog, significant increases in peak hourly average concentrations of nitrogen dioxide are predicted at the Central/Western AQMS, peak concentrations are expected to increase by approximately 8%.
- Continued exceedances of the AQOs at the Mong Kok, Sham Shui Po and Kwun Tong AQMS are predicted. However, Mong Kok AQMS continued to be the only station deemed non-compliant.
- All AQMS should continue to meet the AQO for ozone. Concentrations may decrease by approximately 20 $\mu\text{g}\text{m}^{-3}$.

5.3.3.5 Low Growth Scenario

This scenario represents the lower bound assumption used in the analysis. Under this scenario, both population growth and vehicle growth are limited. Infrastructure provision is limited but considered sufficient to meet the objectives for mobility.

Annual Average Concentrations of Nitrogen Dioxide and RSP

Tables 5.3r and 5.3s present the changes in annual average concentrations of nitrogen dioxide and RSP predicted at each of the AQMS in the SAR in 2016.

Table 5.3r
Annual Average Concentrations of Nitrogen Dioxide ($\mu\text{g}\text{m}^{-3}$)

AQMS	1997	Increment	Total
Central/Western	58	-0.9	57.1
Mong Kok	85	-0.1	84.9
Sha Tin	49	2.2	51.2
Yuen Long	61	6.1	67.1
Tsuen Wan	68	0.1	68.1
Kwai Chung	49	2.9	51.9
Sham Shui Po	71	-1.0	70.0
Kwun Tong	74	2.0	76.0
Tai Po	50	-2.2	47.8

The predictions indicate that four out of nine AQMS will show improvements in 2016 under this scenario. Although a slight reduction is predicted for Mong Kok AQMS, it will still be non-compliant with the AQO in 2016.

The territory-wide changes in nitrogen dioxide concentrations are presented in Figure 5.3s. Increased levels of this pollutant are predicted in the Northwest New Territories and the eastern sector of the Hong Kong Island South district. The most marked increases are in the order of 5 $\mu\text{g}\text{m}^{-3}$ and are predicted to arise in Yuen Long and Fanling. This repeats a pattern observed in the other scenarios presented so far and is considered to be attributable to increased cross boundary traffic flows and the