

## HIGHLAND HOUSING MARKET PARTNERSHIP

### TECHNICAL NOTE ON THE USE OF THE HNDA TOOL IN HIGHLAND

#### Introduction

The Housing Need and Demand Assessment (HNDA) Tool developed by the Scottish Government's Centre for Housing Market Analysis (CHMA) has been used to assess the total future housing requirement and the split between open market housing and housing that needs subsidy (affordable housing). This note describes some of the key features of the way the tool has been used in Highland.

#### Using the HNDA Tool

##### Basics

The HNDA tool is available to download from the Scottish Government web site<sup>1</sup> and the versions available have evolved through time: version 1.13 has been used for the Highland HNDA. This version was being updated at the time of undertaking the analytical work for our HNDA but the timescales for our Local Housing Strategy (LHS) and Highland wide Local Development Plan (HwLDP) dictated that we could not afford to wait for the improved version.

In the *map* worksheet the area was set to Highland which sets the tool up to use our 10 housing market areas (HMAs), and the start date 2012.

##### Household Projections

Four in-house Household projection scenarios for each HMA have been used in the tool: principal, high and low migration scenarios based on the equivalent NRS scenarios, and an in house "HNDA scenario" that is described elsewhere. In order to avoid manual pasting of data into the individual HMA worksheets, the projections have been pasted as values into cells FS18 to GB112 of the *data* worksheet, with the HNDA scenario pasted into the *alternative headship* area and this original name retained throughout.

##### Existing Need

Our LHS and HwLDP start in mid 2015 and the backlog of existing need should be removed starting in 2015. The tool start date is 2012 and a delayed start facility is not available so the time for removal has been extended by 3 years (ie the period between 2012 and 2015) and the existing need increased accordingly:

For the HaTAP method existing need is 590 and will be removed over 5 years starting in 2015 at a rate of 118 per year: this is equivalent to 944 removed over 8 years at the same rate starting in 2012.

Using the Highland in house existing need figures the need is 2,144 and will be removed at a rate of 214 per year starting in 2015: this is equivalent to 2,787 removed over 13 years at the same rate starting in 2012.

For HaTAP the revised figures have been pasted as values into cells FS202 to GB202 in the *data* worksheet. The Highland figures for existing need were pasted as values into the relevant cells in the individual HMA worksheets.

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<sup>1</sup> <http://www.scotland.gov.uk/Topics/Built-Environment/Housing/supply-demand/chma/hnda>

## The Affordability Model

In early runs of the HNDA tool we examined the impact of the affordability model. The results showed that, in simple terms, around half of the households in need were allocated to the private sector, which arises from the assumption in the model that households in need have the same income characteristics as the total population. In practice this is not the case and households in need are usually in this position because of either low income, or personal circumstances (such as disability, single parent households etc) that result in low income. We have therefore taken the decision not to use the affordability model in the scenario used in our HNDA, although the results of using the affordability model are reported in the results summary and sensitivity analysis.

## Results

The results presented in our HNDA and elsewhere have been extracted from the *RawResultsScenario* worksheet. Where a Highland total is quoted it is the sum of the results for the 10 HMAs (for the household projections the Highland figure is equal to the sum of the HMAs, but the use of thresholds in the analysis carried out by the tool means that the results from treating Highland as one single area will not be exactly the same as the sum of the results for ten individual areas).

Our HwLDP looks 20 years ahead from 2015 which is beyond the end of the period covered by the tool. The final years of results in the tool have therefore been averaged and this figure assumed to continue through the additional years.

## Income, Rent and House Price Data

We know that rents vary across Highland and would have preferred to use data specific to each HMA rather than the global figures for the Highlands and Islands embedded into the model, but have been unable to source robust local data for our rural HMAs. We have therefore used the embedded rent (also income and house price) data throughout. In order to use a consistent data set for the base year of 2012 the model uses the original v1.13 data set and has not been updated to use the 2013 data released in November 2014.

## The HNDA Scenario

In total 29 scenarios have been investigated using the tool, and for the most part the results have been used for sensitivity analysis (documented elsewhere) rather than directly in our HNDA. The HNDA Scenario has been used as the basis for our HNDA and, apart for household growth and existing need, uses the default parameter values that give the core results reported in the tool. For the avoidance of doubt the settings used in the HNDA scenario are shown in the table below:

<b>1 Household Projection</b>	HNDA scenario (household growth figures pasted into the "Alternative Headship" data area)
<b>1 Household Growth Adjustment</b>	Not used
<b>2 HaTAP</b>	Not used
<b>2 HC backlog Scenario</b>	2,144 (excludes overcrowding) over 10 years starting 2015 (2,787 over 13 years starting 2012 as tool input data)
<b>2 Backlog Years from 2015</b>	10
<b>2 Affordability Model?</b>	No
<b>3 Income Data</b>	CACI
<b>3 Income Scenario</b>	Modest increases (core)
<b>3 Income Distribution</b>	Flat

<b>3 Select part of income distribution</b>	Not used
<b>4 House Price Scenario</b>	OBR estimates (core)
<b>4 Percentile</b>	25%
<b>4 Income Ratio</b>	4
<b>5 Percent Who Buy</b>	50%
<b>5 Lower Income Threshold</b>	25%
<b>5 Upper Income Threshold</b>	35%
<b>5 Rent Growth Scenario</b>	OBR estimates (core)

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