

## Chapter B15 - STANDARD FOR VALUATION OF CARBON

### Standard for Valuation of Carbon

#### Purpose

The purpose of this standard is to estimate the market value of the carbon trading opportunity associated with the future carbon sequestration by a tree crop. The focus is on the carbon trading opportunity under the New Zealand Emissions Trading Scheme (ETS).

The standard seeks to ensure that there is consistency in the valuation of carbon, tree crop and land.

#### STANDARD B15.1 Definition

This Standard is concerned with the value of the carbon trading opportunity associated with the future carbon sequestration by a tree crop on post-1989 forest land. Other components of value that are not included are the value of:

- Carbon units that have been received (following filing of an emissions return) and retained;
- Carbon units that have been earned (i.e. sequestered) but not yet received.

The valuation report should clearly state what is being valued (and what is not being valued).

#### STANDARD B15.2 Separation of carbon value

After ETS registration is confirmed, the value of the carbon trading opportunity should be reported separately from the value of the tree crop and the value of land.

#### STANDARD B15.3 Method of Valuation

In estimating the value of carbon (i.e. the value of the carbon trading opportunity associated with the future carbon sequestration by a tree crop) the valuer shall document the method used.



**STANDARD B15.4**  
**Consistency**

The valuation report shall document:

- the scope for the valuation with respect to each component of forest value (e.g. land, tree crop, carbon);
- how consistency has been achieved in the valuation of the different components; and
- that the components are ‘additive’ (i.e. no double counting or leaving out components).

**STANDARD B15.5**  
**Reality checks**

The valuation report shall document reality checks of the component values and overall forest value.

**STANDARD B15.6**  
**Carbon stocks**

The valuation report shall describe:

- the date at which post-1989 forest land was registered in the ETS;
- the age of the crop(s) at the date of valuation;
- the area of each Carbon Accounting Area (CAA);
- the accounting method chosen for each CAA: stock change, averaging, permanent;
- the method of forecasting future carbon stocks including whether standard carbon (i.e. look-up) tables or participant-specific carbon tables have been used;
- the standard carbon table used (if relevant);
- the assumed rotation age (if relevant);
- any models used to estimate future carbon stocks including:
  - species
  - area
  - silvicultural regime
  - site productivity; and
- the estimates of carbon stock by stand age (or year).

**STANDARD B15.7**  
**Carbon trading strategy**

The valuation report shall describe:

- the frequency of carbon returns assumed; and
- whether all units earned are assumed to be sold.



**STANDARD B15.8**  
**Carbon price**

The valuation report shall describe:

- the carbon price used including:
  - units
  - currency
  - exchange rate used to convert (if applicable)
  - allowance for trading costs (commission)
  - whether future prices are real or nominal
  - the method used to estimate carbon price;
- any market information used in support of prices:
  - sources of data
  - relevance of data
  - reliability of data
  - price volatility;
- assumed future real price changes (including zero change); and
- the results of any analysis that has been done.

**STANDARD B15.9**  
**Costs**

The valuation report shall:

- declare all costs associated with the carbon trading opportunity including registration, measurement, audit, filing emissions returns, annual fees, commissions as well as relevant carbon-specific overhead and administration costs.
- in the case of permanent forestry (without clearfelling), declare all costs associated with establishing, managing and maintaining the trees including overhead and administration costs associated with growing the trees. Net revenues from thinnings should also be declared.

**STANDARD B15.10**  
**Land rental**

The carbon trading opportunity should carry land rental on the component of land value that exceeds the forestry-only component of land value borne by the tree crop.

**STANDARD B15.11**  
**Discount rate**

The valuation report shall adhere to Standard B10.

**STANDARD B15.12**  
**Uncertainty**

The valuation report shall adhere to Standard B9.

