The Certification Mark for Onsite Sustainable Energy Technologies

MCS

MCS Transitional Arrangements

For Hydro Turbine Products and Installation Companies

Version 0.1

15th March 2011

Introduction

The following information explains more of the rationale and how this will work.

The transition will be on a case-by-case submission basis, as companies have approached their implementation of their MCS certification in different ways.

Company submissions will be made to the scheme administrator, Gemserv, by email (mcs@gemserv.com), explaining; how the company is complying with the minimum requirements, what the company is doing to complete their MCS certification and a brief history of why they have not been able to achieve their MCS certification so far.

To ensure that customers can maintain their confidence in those products that have not completed their MCS certification, a structured framework for the transition has been established.
This includes: -

- minimum criteria to be met for the products being registered;
- a declaration from the applicants that commits them to either remediation or recompense, to customers, if their products do not achieve the additional requirements of the MCS certification process (i.e. those elements that were additional to what they had already passed as minimum criteria) should those additional requirements be of material consequence to the customer.

PART 1

Hydro Product Transition Arrangements

Hydro Turbines

The MCS Hydro turbine product standard has now been developed by the Micro Hydro Working Group. The Hydro Working Group has established transitional arrangements for micro hydro products.

Transition Timeframe

The Micro Hydro Product Transition scheme will be open to new applicants until after the MCS Hydro Product Standard is approved and issued, and until at least three months after the first Certification Body has been accredited to offer certification services against it.

At that point, entry to the list will close. Those products remaining on the list will have a maximum of three months after that to become MCS Certificated, at which point all products will be removed from the list.

(Should the first Certification Body become accredited less than 6 months from the date of the publication of the MCS Product Standard, then the list will remain in place for 6 months after the date of the Standard's publication, to ensure that applicants have been allowed sufficient time to prepare for certification against the Standard).
For clarity the diagram below details the sequence of events:

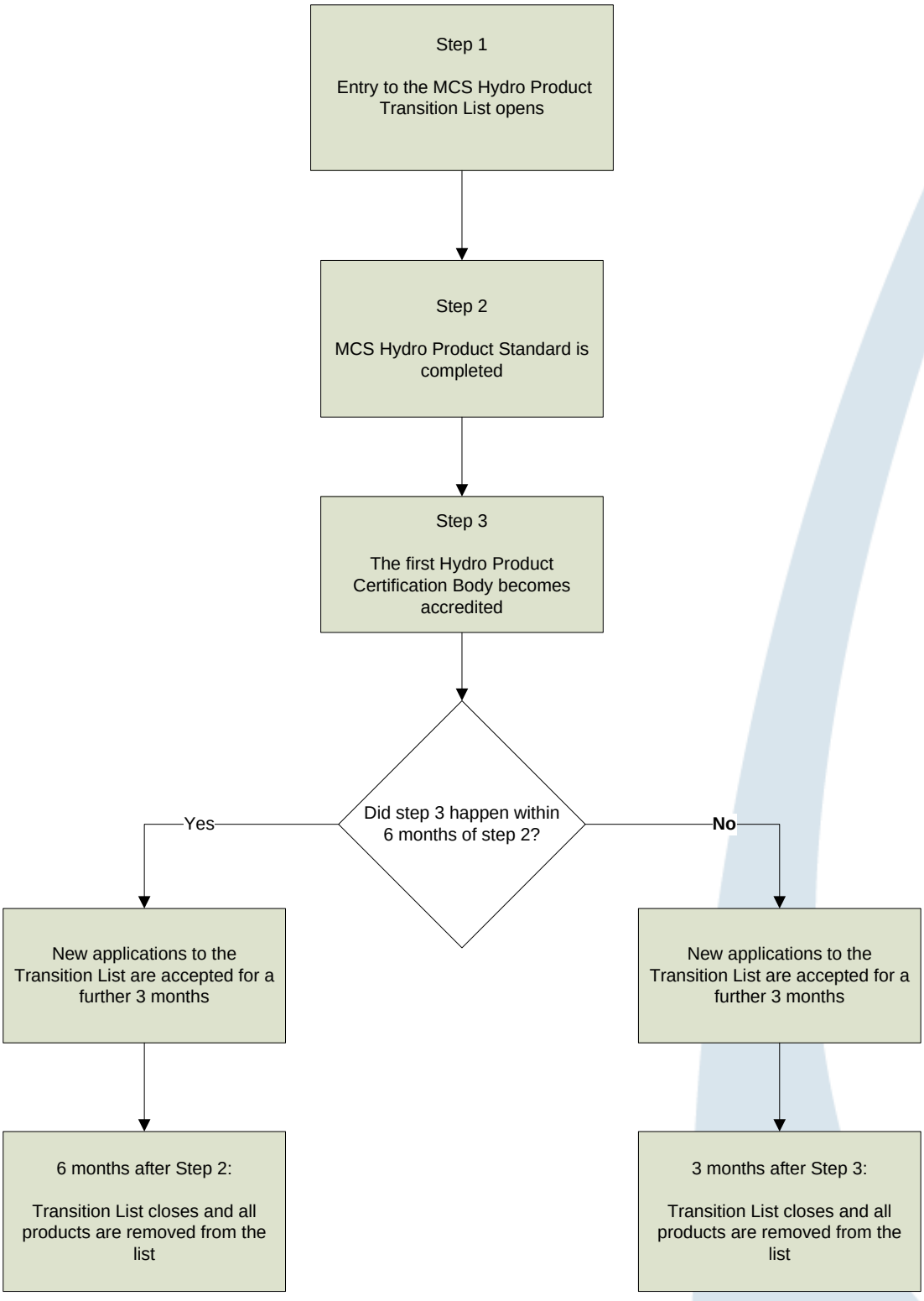

Figure 1: Sequence of events for Hydro Product Transition

Transition Criteria

The minimum criteria for Hydro Products to be eligible for MCS Hydro Transitional Arrangements shall be the following:

1) Intent to become MCS Certificated
    a. correspondence and/or a “heads of agreement” with a Certification Body, who have acknowledged that the manufacturer and/or supplier intends to become certificated to the MCS Hydro Product Standard when this is completed and issued,
2) Documentation or reports with details under the following three areas:
    a. Power Performance
    b. Rated efficiency and optionally an efficiency vs. flow curve shall be presented along with tabulated data points. This curve should extend from 0 % to 100 % of rated flow and error bars should be included with a justified range. Efficiency shall be determined by measurement of either mechanical or electrical power. The procedure by which the above rated efficiency and efficiency vs. flow curve(s) were determined should be documented in sufficient detail to allow for validation and verification of all relevant data.
    c. Safety and Function
        i. Guidance on guarding, safe operational pressures, and safe lifting points should be included with the products.
        ii. Maintenance, operation and installation manuals should also be included with the products.
    d. Environmental
        i. Demonstrate a neutral environmental impact in terms of environmental contaminations from bearing lubricants.
3) A completed Declaration (see Annex 1) returned to the MCS Licensee.

PART 2

Hydro Installation Company Transition Arrangements

Introduction

The MCS Micro Hydro Working Group has now developed a Standard for Micro Hydro Installers. It is recognised that, until that work is completed, an interim arrangement is needed, which will allow suitable Micro Hydro installers to operate under MCS, enabling customers to access the Scheme but without compromising the quality assurance it provides.

Installer transition arrangements will only be applied to hydro installers who fulfil the criteria here-in, and not applicable to installers of other technologies currently included in the MCS scheme.

To ensure that customers can maintain their confidence in those micro hydro installers that have not completed their MCS certification, a structured framework for the interim has been established.

This includes: -

- minimum criteria to be met for the installer being registered;
- a declaration from the applicant that commits them to either remediation or recompense, to customers, in certain circumstances as set out in Annex 2

Transition Timeframe

The Micro Hydro Installer Transition scheme will be open to new applicants from **25th June 2010** until after the MCS Installer Standard is approved and issued, and until at least three months after the first Certification Body has been accredited to offer certification services against it.

At that point, entry to the list will close. Those installers remaining on the list will have a maximum of three months after that to become MCS Certificated, at which point all installers will be removed from the list.

(Should the first Certification Body become accredited less than 6 months from the date of the publication of the MIS 3006 Micro Hydro Standard, then the list will remain in place for 6 months after the date of the Standard's publication, to ensure that applicants have been allowed sufficient time to prepare for certification against the Standard).

For clarity the diagram below details the sequence of events:

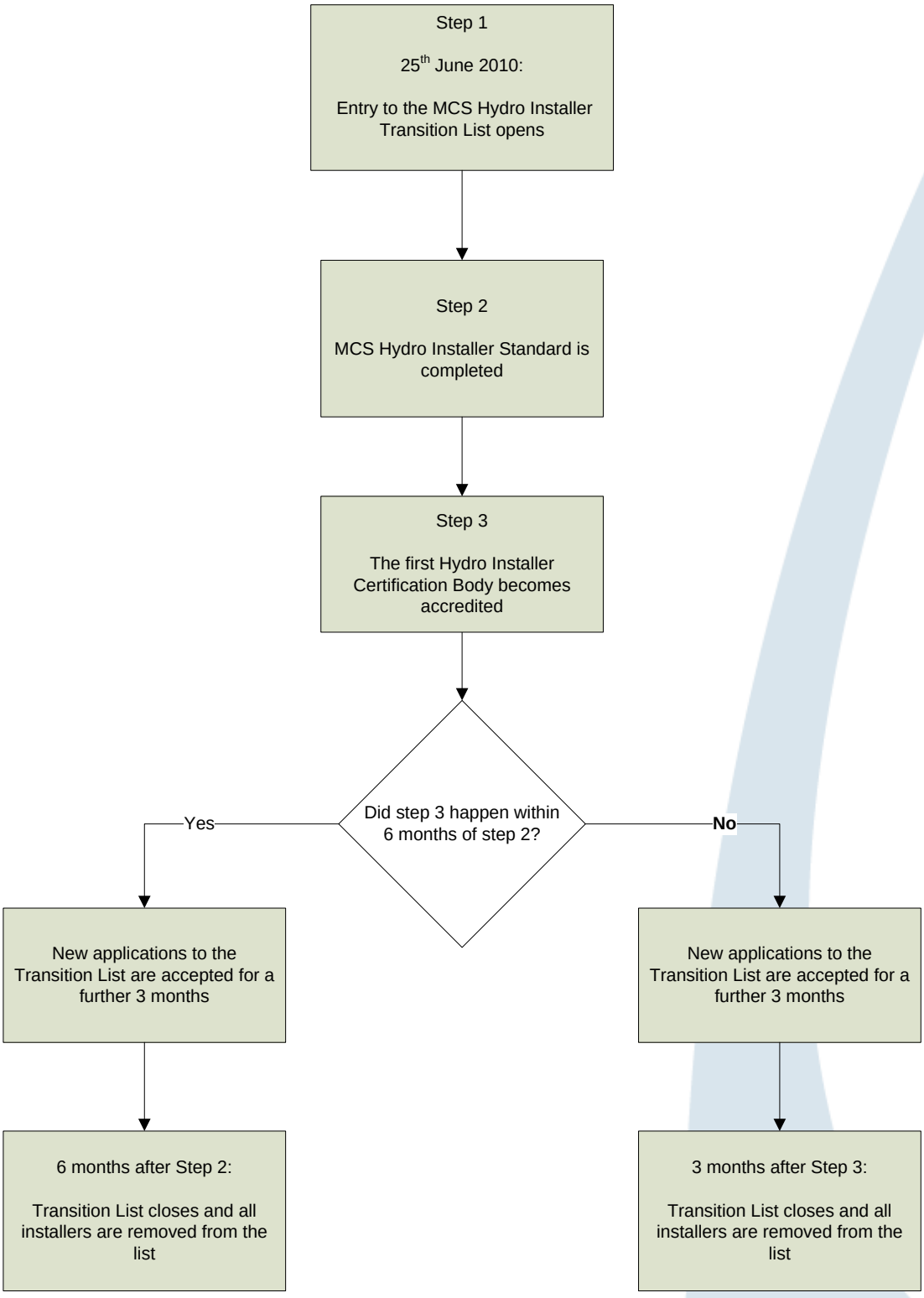

Figure 2 Sequence of events for Hydro Installer Transition

The Transition Evaluation Team (TET – see below) will keep the above timescales under review to ensure their continued appropriateness, and will give all Transition Installers at least 30 Working Days' notice should they be changed.

* The TET has adopted a case-by-case based approach and exceptional circumstances can be taken into consideration.

Transition Minimum Requirements Criteria:

The minimum criteria for Micro Hydro Installers to be eligible for MCS Micro Hydro Transitional Arrangements shall be as follows:

1) Intent to become MCS certificated;

   Correspondence and/or a "heads of agreement" with a Certification Body (which intends to offer Certification services against the forthcoming Micro Hydro Standard MIS3006) who have acknowledged that the installer and/or installer company intends to become certificated to the MCS Micro Hydro Installer Standard when this is completed and issued.

2) An appropriately completed 'Declaration' (see Annex 2), returned to the MCS Licensee (mcs@gemserv.com)

3) Membership to the REAL Assurance Scheme or signing up with any approved Code of Practice that meets the Office of Fair Trading (OFT) Consumer Code Approval Scheme; http://www.realassurance.org.uk/ .

4) Demonstration of the Installer's competence in installing Micro Hydro products, this shall be in the form of a written submission related to the installer's capability in undertaking Micro Hydropower system installation.

   This should cover the following:

   a. Electrical systems design, including compliance with the current edition of the Wiring Regulations (BS 7671) and in particular, section 551, which considers low voltage generating sets. Compliance with any other applicable standards (e.g. Engineering Recommendation G83/1 or G59/1 for grid connected systems). More generally,

      i. Understanding of conventional AC systems (50 Hz, fixed nominal voltage);

ii. Understanding of non-conventional AC systems (e.g. the variable frequency, voltage and current characteristics of generators);
iii. Understanding of battery systems (if appropriate), in particular, sizing, charging and discharging characteristics, depth of discharge, ventilation and dump loads;

b. Mechanical systems design
   i. An understanding of requirements and principles BS:EN61116 Electromechanical equipment guide for small hydro installations
c. Safety considerations for example safe lifting, site safety and guarding.
d. Environmental considerations
e. Energy performance calculations
f. Licensing and regulatory requirements

Transition Evaluation Team

Each submission will be reviewed by a Transition Evaluation Team (TET). The TET consists of the Chair of the Steering Group, plus two other permanent members (preferably from the Steering Group and neutral to any technologies) and a fourth member selected for their expertise in Micro Hydro installations. The members of the transition team will be impartial and will have to declare any conflicting interests as, or if, they arise and stand down for the discussion.

Part 3

Hydro 'As New' Product Transition Arrangements

1) Intent to become MCS certificated;
   Correspondence and/or a "heads of agreement" with a Certification Body (which intends to offer Certification services against the 'As New' Hydro Product Standard) who have acknowledged that the company intends to become certificated to the MCS 'As New' Hydro Product Standard when this is completed and issued.

2) An appropriately completed 'Declaration' (see Annex), returned to the MCS Licensee (mcs@gemserv.com)

3) Documentation or reports with details under the following areas:
   a. Power Performance
      i. Explanation of the general method by which original and remanufactured power performance will be determined.
   b. Explanation of the general method by which original and remanufactured efficiency at rated flow (and optionally at part flow) shall be determined by reference to documents or reverse engineering (in the original case) and measurement of either mechanical or electrical power (in the remanufactured case). The above method should describe how error bars will be determined or otherwise justified. The above method should be documented in sufficient detail to allow for validation and verification of all relevant data.
   c. Safety and Function
      i. General points on guarding and safe lifting.
      ii. General points on installation, commissioning, operation and maintenance.
   d. Environmental
      i. General points on demonstrating a neutral environmental impact in terms of environmental contaminations from bearing lubricants.

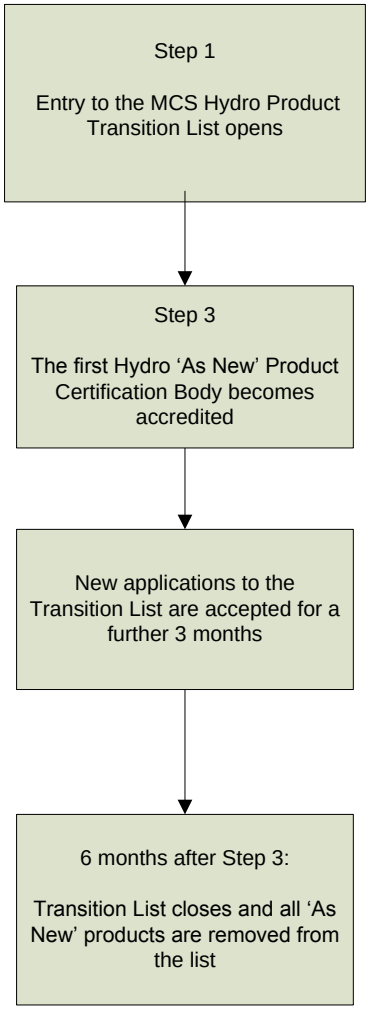

Figure 3 details the listing process for 'As New' Transition Product Companies.

Part 4 – General

All other requirements of the MCS product and associated standards will be required for full certification.

Declaration

It is a requirement of the transition agreement that a declaration will be signed and dated by an authorised director of the Manufacturer / Distributor Company applying for any product to be added to the transition list. See Annex 1 for the wording of the Declaration for all technologies.

Transition Evaluation Team

As the transition arrangements are going to be decided on a case by case submission, it has been decided that a Transition Evaluation Team will be established to review and agree on the submissions received.

However, for this to function, the team reporting to the Steering Committee will need to be independent and unbiased while having a competence to evaluate a particular technology's issues. Therefore it is proposed that the Evaluation Team should consist of, the Chair plus two other permanent members (preferably from the Steering Group and neutral to any technologies) and a fourth member selected for the Technology being discussed (preferably from a trade association). The members of the transition team will be impartial and will have to declare any conflicting interests as, or if, they arise and stand down for the discussion.

Technology Update

It was decided that those products that were deemed to be so new or innovative that it would be difficult to meet the transition deadlines, would not be included as transition products and will follow the standard MCS Certification process.

The following is a quick appraisal of the sectors discussed. Other sections of this document explain the criteria under which the technologies are recognised as in transition and what additional requirements will be needed to comply with the MCS standards.

Population of the criteria will need to be carried out in consultation with industry. Certain elements will be constant across all technologies, such as, the minimum thresholds for engaging with Certification Bodies; however a consistent and balanced approach to the criteria will be required.

Annex 1 – Product Declaration

This declaration applies only to the installation of MCS transitional products installed within the UK market where the manufacturer (or product company) have sold it as an MCS transitional scheme product, and does not apply to transitional products installed outside the UK.

I, (Director of Company Ltd), declare that,

Whenever any organization promotes, advertises or offers for sale any Transition List product, that organisation will ensure the following text is prominently displayed:

“Please note that (XXX PRODUCT) has been classified as a ‘Transition Product’ under the Microgeneration Certification Scheme (MCS).”

MCS transitional products may be removed from the MCS Transitional Arrangement (MCS-TA) by the MCS Transitional Evaluation Team (TET) following a 30 day consultation between the TET, the associated manufacturer (or product company), and the associated Certification Body.

A transitional product will be removed from MCS Transitional Arrangements on the following basis:

1. The transitional product fails to satisfy MCS-TA registration requirements in accordance with technology specific time requirements, or;
2. The transitional product fails to satisfy full MCS certification in accordance with technology specific time requirements, or;
3. The transitional product develops serious issues during the transitional period such that the transitional product is deemed unlikely to satisfy full MCS certification, or;
4. The transitional product’s manufacturer, or associate product company, submits a written request for the removal of the related product from MCS-TA to the TET.

Should a transitional product be removed from the MCS-TA, the associated manufacturer (or product company) must undertake the following:

1. Provide the customer, and installation company, with full disclosure as to the removal of the product from MCS-TA, and;

2. Agree with the customer to either:
    a) Enact remedial work with regard to the customer's product such that the customer is satisfied, or;
    b) Provide a refund of the cost of the product (excluding installation costs) to the customer or the installer, or;
    c) Act as otherwise agreed with the customer and installer.

Should the fully certified product possess performance characteristics significantly different from a related transitional product, the associate manufacturer (or product company) must undertake the following:

1. Provide the customer, and installation company, with full disclosure as to the differences between the MCS-TA product and the Certified Product, and;
2. Agree with the customer to either:
    a) Enact remedial work with regard to the customer's product such that the customer is satisfied, or;
    b) Provide a refund of the cost of the product (excluding installation costs) to the customer or the installer, or;
    c) Act as otherwise agreed with the customer and installer.

Should a transitional product not complete full certification in accordance with technology specific time requirements, the associate manufacturer (or product company) must undertake the following:

1. Provide the customer, and installation company, with full disclosure as to the removal of the product from MCS-TA, and;
2. Agree with the customer to either:
    a) Enact remedial work with regard to the customer's product such that the customer is satisfied, or;
    b) Provide a refund of the cost of the product (excluding installation costs) to the customer or the installer, or;
    c) Act as otherwise agreed with the customer and installer.

Signed: _____

Print Name: _____

Company and Position Held: _____

Date: _____

DEFINITION OF TERMS

Declaration: This document

MCS: Microgeneration Certification Scheme: The Microgeneration Certification Scheme (MCS) is an independent scheme that certifies micro-generation products and installers in accordance with consistent standards. It is designed to evaluate micro-generation products and installers against robust criteria providing greater protection for consumers. See www.microgenerationcertification.org

Product Transition List: This is a list of products whose manufacturers are working towards MCS Certification, and which remain on the MCS Product List for so long as they continue satisfy MCS-TA registration requirements in accordance with technology specific time requirements.
See http://www.microgenerationcertification.org/Transitional+Arrangements

Installer: An organisation certificated under the Microgeneration Certification Scheme (MCS) that is responsible for all of the following activities: supply, design or design review, installation, set to work and commissioning of Microgeneration systems and technologies.

Customer: A company or individual contracting with an Installer to procure and install and MCS-certificated product.

Manufacturer (or product company): The company that signs The Declaration.

Annex 2 – Installer Declaration

This declaration applies only to installers of MCS Certificated and MCS Transition products that are installed within the UK, where the installer is providing their services in the capacity of an MCS Transition Installer.

I, _____(Director / Proprietor of (Company)), declare that,

Whenever (Company) promotes, advertises or offers for sale its MCS certificated Micro-Hydropower System installation services, it will ensure the following text is prominently displayed:

“Please note that (Company) has been classified as a ‘Transition Installer’ under the MCS

I understand that:

MCS Transition Installers may be removed from the MCS Transitional Arrangements (MCS-TA) by the MCS Transitional Evaluation Team (TET) following a 30 day consultation between the TET, the associated Installer, and the associated Certification Body.

A Transition Installer may be removed from MCS Transitional Arrangements following one of the circumstances listed below:

1. The Transition Installer fails to satisfy MCS-TA registration requirements in accordance with applicable time requirements, or;
2. The Transition Installer fails to complete full MCS certification in accordance with the applicable time requirements, or;
3. The Transition Installer develops serious issues during the transitional period such that the Transition Installer is deemed unlikely to satisfy full MCS certification requirements, or;
4. The Transition Installer submits a written request to the TET for its removal from MCS-TA.

I undertake that:

If (Company) is removed from the MCS-TA for any reason, and / or does not complete full certification in accordance with the applicable time requirements, it will undertake the following:

3. Provide the customer with full disclosure as to the removal of the company from MCS-TA, and;
4. Agree with the customer to either:
   a) Provide a refund of the original cost of the installation to the customer; or
   b) Meet the cost of having the installation completed and commissioned by another agreed MCS or MCS-TA certificated Installer, or
   c) Act as otherwise agreed with the customer

Signed: _____

Print Name: _____

Company and Position Held: _____

Date: _____

DEFINITION OF TERMS

Declaration: This document

MCS: Microgeneration Certification Scheme: The Microgeneration Certification Scheme (MCS) is an independent scheme that certifies micro-generation products and installers in accordance with consistent standards. It is designed to evaluate micro-generation products and installers against robust criteria providing greater protection for consumers. See www.microgenerationcertification.org

Installer Transition List: This is a list of installers that are working towards MCS Certification, and which remain on the MCS Installer List for as long as they continue to satisfy MCS-TA registration requirements in accordance with applicable specific time requirements.
See http://www.microgenerationcertification.org/Transitional+Arrangements

Installer: An organisation certificated under the Microgeneration Certification Scheme (MCS) Installer standards. .

Customer: A company or individual contracting with an Installer to procure and install MCS-certificated product.

Company: The trading name of the organization that is undertaking to comply with the requirements of this declaration.

AMENDMENTS ISSUED SINCE PUBLICATION

DOCUMENT VERSION NO.	AMENDMENT DETAILS	DATE
0.1	First draft.	08/02/2011