### An Overview of Competency in Verifier Accreditation



the society of greenhouse gas professionals

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### **About GHGMI**

#### Training

- GHG accounting/verification frameworks (ISO/GHGP)
- Programmatic reporting (e.g., TCR, CDP, CDM/JI)
- Sectoral accounting (e.g., forestry, energy efficiency, CMM)

#### Infrastructure

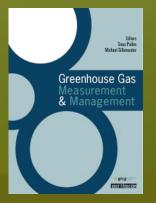
- GHG program design infrastructure
  - Verifier accreditation systems
  - Program support and training
  - International development scheme capacity building
- Professional infrastructure for MRV practitioners
  - Professional certification
  - Code of ethics
  - Community (e.g., GHG Experts Network → GHGMI Forum)

#### Research

- Greenhouse Gas Measurement & Management journal
- Discussion papers, joint initiatives (e.g., CORE, OQI)
- Academic collaborations on carbon management education

World's largest MRV course catalogue







### The Role of GHG Data

- Backbone of any process involving mitigation action
- Used for different purposes and at different levels:
  - International: to assess compliance of Parties with commitments (UNFCCC/KP)
  - Regional: to identify key sectors/gases
  - National: to design appropriate activities
  - Project: to monitor effectiveness



### **Data Applications**

- Scientific inquiry
- Marketing & PR
- Voluntary programs & markets
- Compliance & trading

Policies depend on reliable emissions data

# Science vs Implementation

### Data quality characteristics

- Point estimates: accounting <u>and</u> science
- Uncertainty in trend or change relative to baseline (not absolute total)
- Robustness of metrics (protection from manipulation/gaming)
- Ease of verification for compliance
- Fairness (or perceived fairness)
- Clarity of attribution

Accounting

MRV

### **MRV Implementation Infrastructure**

- Scientific knowledge/technologies
- Legal/regulatory
- Information management and decision support systems
- Standards (rules, codes, etc.)
- Human resources and educational systems

### **Implementation Challenges: The Workforce**

#### New discipline

- Finite amount of experience/expertise
- Limited training opportunities
- Few tools and information resources
- Confusing, fast-changing, sometimes inconsistent program rules

#### Perceived/real barriers to entry

- Intangible: Invisible gas/commodity on paper
- Domain concepts/TLAs obtuse to observers
- No clear professional path
- Not integrated into formal education
- Insular community

### GHG Data in Carbon Markets

- The voluntary market

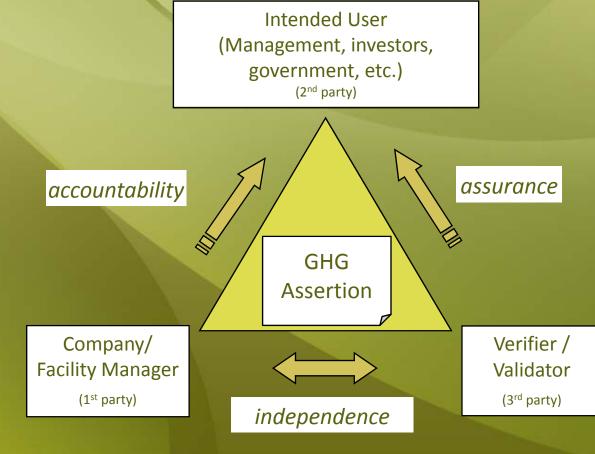
  Voluntary inventory programs
  Voluntary offset schemes

  The compliance market

  Obligatory GHG inventories
  Compliance eligible offsets
- How is GHG data assured in these schemes?
- Do these programs have different objectives?
- Does/should verification vary?



### **GHG** Verification



1<sup>st</sup> (Reporter/Seller) 2<sup>nd</sup> (Buyer/User) 3<sup>rd</sup> (Auditor)

GHG program Accreditation body Public (watchdog)

### **Diversity in Program Objectives**

How does a program balance...

- Cost
- Speed
- Environmental integrity
- Control/governance
- Other ancillary considerations (e.g., local/small business workforce development)

...what do these factors mean for verifier accreditation models?



### **Verifier Accreditation**

Who decides who gets to play?

Program's discretion ...but it varies:
– In-house model
Program is accrediting body
– Outsourced models
• Relies on another program's accreditation

 Relies on National Standard Body (NSB) accreditation



### Assessing Competency in Verifier Accreditation Accreditation models further diverge on competency assessment:

- Off the shelf: Some accept outsourced NSB or other program assessments
- With conditions: Some require additional training/experience

 Go it their own: Require completion of specific training/experience as part of in-house accreditation



## Accreditation models: state of play

Level of	Accreditation	Example	
accreditation	body		
Entity-level accreditation	National standards bodies (NSBs)	ANSI ISO 14065* accreditation	
	Program administrators	UNFCCC CDM/JI verifier (DOE/AIE) accreditation	
Entity-level accreditation + individual course/exam	NSBs (entity); program (individual exam)	Climate Action Reserve verifier accreditation	
requirement	Program (entity); program (individual exam)	California Air Resources Board verifier accreditation†	



### What does the market look like?

					Additional
	NSB	UNFCCC	In-house	Other	Requirements
Offset programs					
American Carbon Registry	Х	Х			
Carbon Fix	Х	Х		FSC	
Climate Action Reserve	Х				Х
CCBS	Х	Х		FSC	
Gold Standard		Х			Χ*
Panda Standard		Х	Χ*		
Plan Vivo	Х	Х		FSC	
Social Carbon Methodology				n/a	
Verified Carbon Standard	Х	Х			
CDM/JI		Х			
NSW GGAS			Х		
Alberta-Based Offset Credit System			Χ*		
Regional Greenhouse Gas Initiative (RGGI)	Х				
California Air Resources Board			Х		Х
Inventory programs					
European Trading System (EU ETS)	Х		Х		
The Climate Registry	Х				
California Air Resources Board			Х		Х



# Can improvements in verifier accreditation get us past the circle of blame?



# **Room for improvement?** • Is it realistic to harmonize different program administrator preferences under an accreditation model? • Will the integration of ISO 14066, which looks at team competency, into 14065 programs offer any help? Can a portable personnel certification

provide some unity?



### More Information **GHG** Management Institute www.ghginstitute.org GHG Measurement & Management journal www.tandf.co.uk/journals/TGMM EP(GHG) professional certification www.epghg.org

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