

Report from the Had Hoc Group of Experts on Fossil Energy and Mineral Resources terminology

***16th Annual session of the UNNECE Committee on Sustainable Energy – Agenda
item 7***



Sigurd Heiberg
Chairperson
UNECE Ad Hoc Group of Experts on
Harmonization of Fossil Energy and Mineral Resources Terminology

Today's requirements

- **Global standards for global markets:**
 - **Global energy studies for robust policies**
 - **Government resource management for efficient recovery and maximum value**
 - **Corporate business process management for efficient industrial activities**
 - **Financial reporting for proper allocation of capital**
- **Relevance**
- **Reliability**
- **Comparability**
- **Practicability**

Thanks are due to the UNECE

- To this committee and its excellent bureau for their confidence and inspiration
- To the Division of Sustainable Energy for their talented and essential support and guidance
- To the two officers serving the Group of experts, **Clark Talkington** who took over from Charlotte Griffiths and **Charlotte Griffiths** who has now taken over for Clark Talkington.

... the Bureau of the Group of Experts

- **Thomas Ahlbrandt**, CEO, Petrohunter Energy Corp. and former Chief, USGS World Energy Studies
- **Fatih Birol**, Chief Economist, IEA
- **Ferdinando Camisani Calzolari**, Representative of CRIRSCO, Mining Consultant and Professor
- **Mohamed Hamel**, Head, Energy Studies, OPEC
- **John E. Ritter**, Past Chairperson of the SPE Oil and Gas Reserves Committee, Senior Director, Worldwide Reserves and Reservoir Engineering, Occidental Petroleum..now replaced by **Delores James Hinkle**, Director Corporate Reserves, Marathon Oil Company
- **Yuri Podturkin**, Chairperson, State Commission on Mineral Reserves, Russian Federation
- **Andreij Subelj**, Senior Researcher, Project Manager, Institute of Mining, Geotechnology and Environment - IRGO

...and to

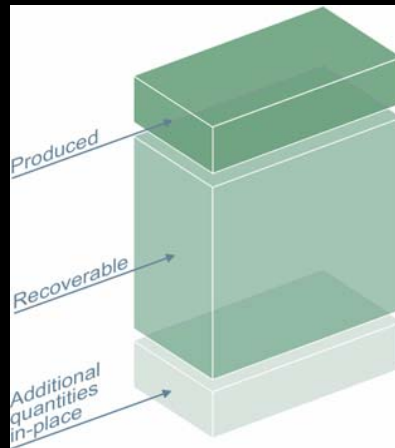
- **Per Blystad**, Coordinator of petroleum stakeholders and Senior Geologist, Resource Analysis, Norwegian Petroleum Directorate (NPD)
- **Mucella Ersoy**, Coordinator of mineral stakeholders and Chief Engineer, Planning, Project Dept., Turkish Coal Enterprises
- Mineral Reserves, International Reporting Standards Committee (**CRIRSCO**) for contributing to the technical task force on minerals
- The Society of Petroleum Engineers (**SPE**) whose Oil and Gas Reserves Committee is the technical task force on petroleum

And all the very active members of the group of experts

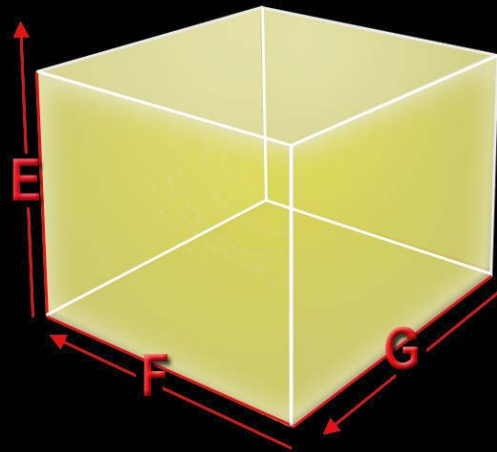
UN Framework Classification (UNFC) for Petroleum



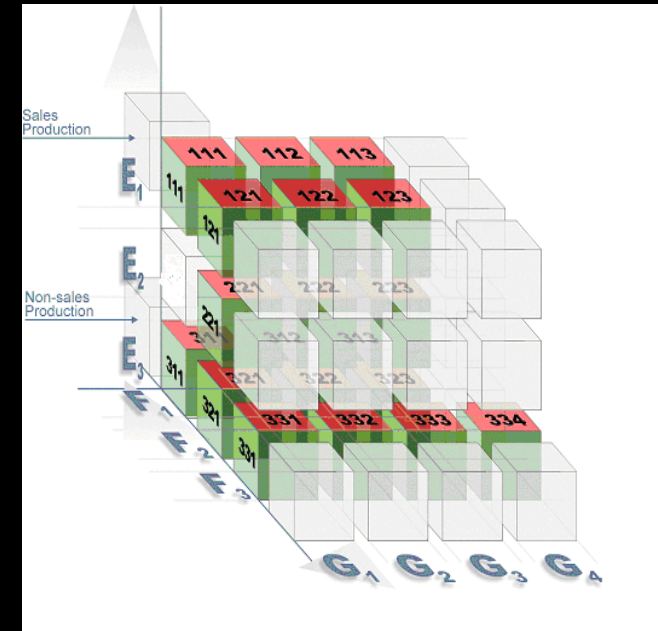
Total in-place



Principles



Classification



Economic and commercial viability

- ◆ E1 Economic
- ◆ E2 Potentially economic
- ◆ E3 Intrinsically economic

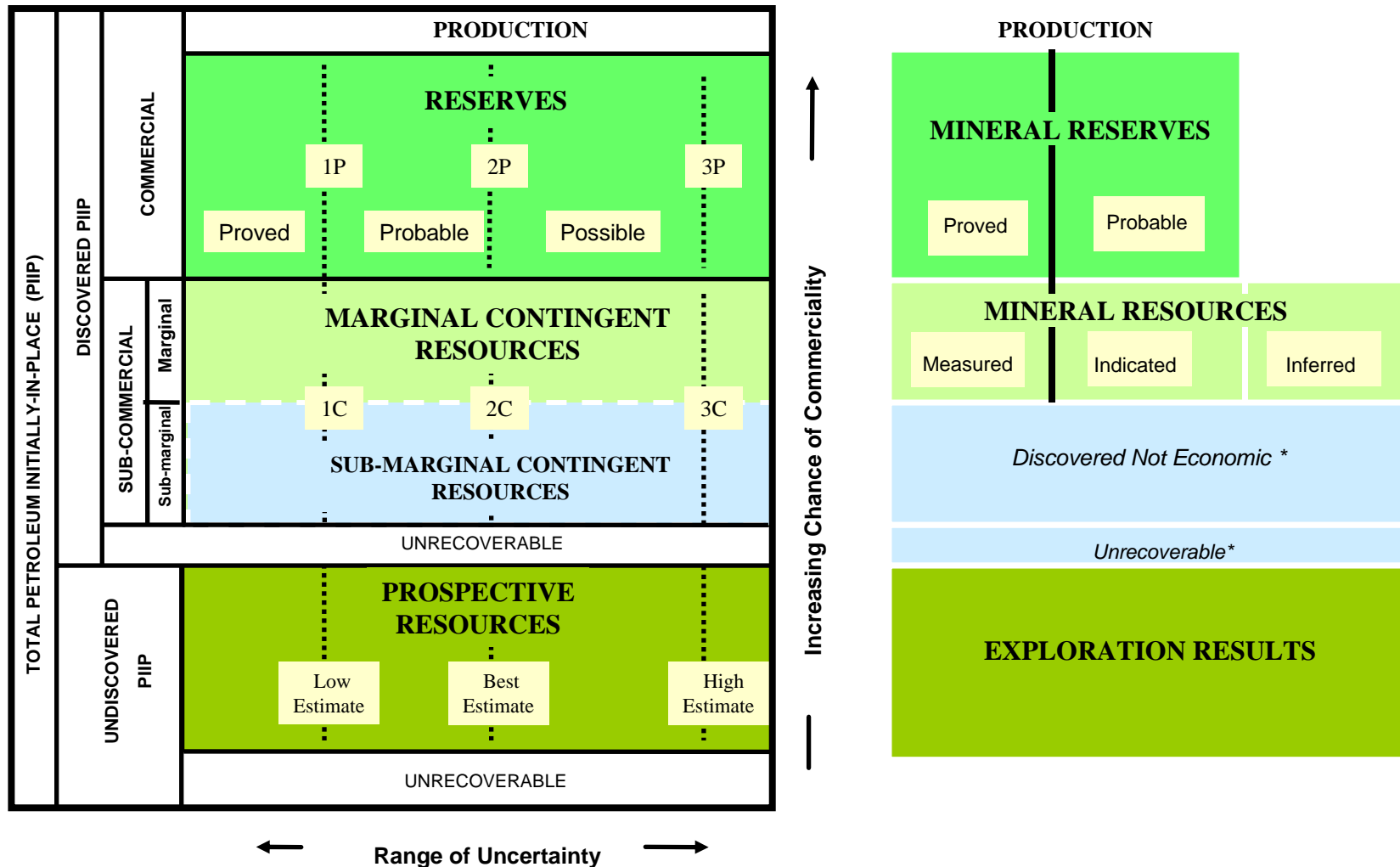
Field project status and feasibility

- ◆ F1 Justified
- ◆ F2 Contingent
- ◆ F3 Undefined

Geological knowledge

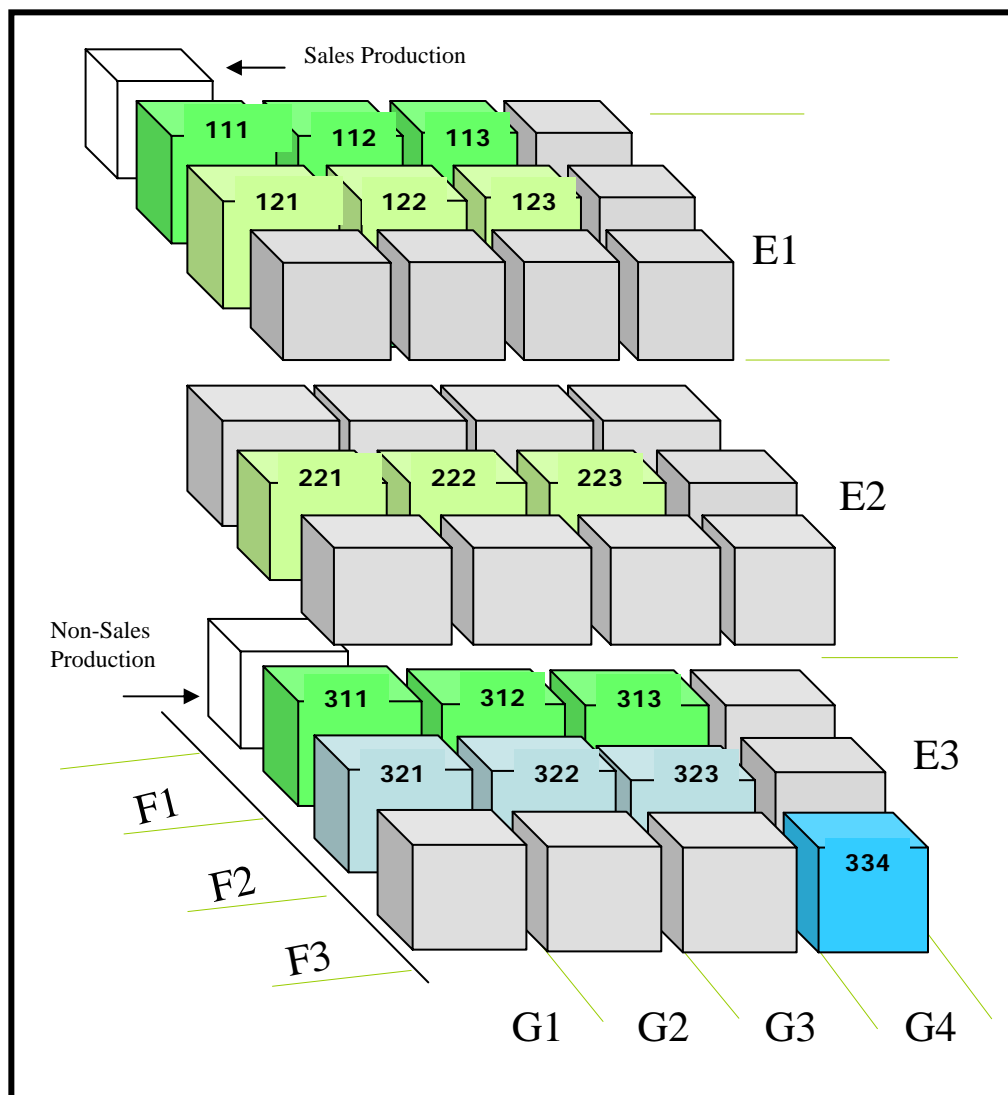
- ◆ G1 Reasonably assured
- ◆ G2 Estimated
- ◆ G3 Inferred
- ◆ G4 Potential

PRMS-CRIRSCO MAPPING



*Not part of the Template but may be used for internal project management

The 12 UNFC Categories



Classes defined by UNFC categories

Fundamental Characterization	PRMS Resources Classes		E axis	F axis	G axis		
					Proved	Probabl e	Possible
DISCOVERED AND COMMERCIALY RECOVERABLE	RESERVES		1	1	1	2	3
							3
DISCOVERED AND NOT COMMERCIALY RECOVERABLE	CONTINGENT RESOURCES	Marginal	2.1	2	1	2	3
		Sub-Marginal	2.2				
	Unrecoverable		3				
					Estimate of Potential		
UNDISCOVERED	PROSPECTIVE RESOURCES		3	3	4.1	4.2	4.3
	Unrecoverable						

Definitions of categories

- Reconsider the current definitions of the UNFC in cooperation with SPE and CRIRSCO to strengthen and shorten the high level definitions to one set for fossil energy mineral resources.
- Develop commodity specific specifications and guidelines as required

Global adoption of the UNFC

- Due process of adopting changes: Deadline for comments: 30th of January 2008
- Specifications and guidelines are researched in parallel
- Application of the UNFC to recipient reservoirs (storage of CO₂, natural gas and other substances)
- The 5th session in April 2008 may recommend changes to the existing UNFC text, to comply with the **ECOSOC resolution 2004/233 inviting the Member States of the United Nations, international organizations and the regional commissions to consider taking appropriate measures for ensuring worldwide application of the Framework Classification.**

Introducing a new terminology

- **Change of standards is a major operation**
- **Change is required by the financial community.**
- **Agreement between IASB and US SEC to harmonize their rules.**
- **Extractive activities are on the IASB research agenda. Discussion paper due in 2008. Implementation of an International Financial Reporting Standard (IFRS) earliest 2012.**
- **UN (via UNECE AHGE) now collaborating closely with IASB and IOSCO (of which SEC a member). Timing of implementation coincide.**

Governance of the AHGE

- The AHGE recommends to the Committee on Sustainable Energy that it renew the mandate of the Ad Hoc Group of Experts for a period of two years, re-emphasising the importance of the Objectives contained in its Terms of Reference, but also to continue consideration of other future options.
- Activities change from seeking global acceptance for the UNFC to to meet the need for lasting reliability of the terminology. This requires funding of permanent capacity.

Success depends on continued cooperation with a wide range of stakeholders

- **UN bodies**
- **Governments,**
- **NGOs and business community/private sector.**
- **International organizations, incl. IAEA, IEA, IEF, OPEC, WEC, and WPC.**
- **Professional associations, incl AAPG, CRIRSCO, EFG, IASB, IOSCO, IVSC and SPE.**

Some recent activities

- Meeting with representatives of the UNSD London Group, Copenhagen, May 2007
- AAPG/SPE Multidisciplinary Meeting on Reserves in Washington, June 2007
- Annual meeting of the Group of Experts, October 2007
- The 2nd International Energy Statistics meeting at the IEA 19th -20th of November 2007
- AAPG meeting in Athens 21st of November
- **NB! 5th Session of the AHGE In Geneva, 15-17th April, 2007**

Thank you

<http://www.unece.org/ie/se/reserves.html>

Source: City lights, NASA