



OIL, GAS AND PETROCHEMICALS TRAINING

Fuel Blending, Product Quality and Specifications

5 day course

Classroom, online or in-house

Course overview

Every finished fuel batch is a compromise between specification limits and the cheapest components that will meet them, and a missed flash point or vapour pressure means a costly reblend or a rejected cargo. Sessions cover the key properties of gasoline, jet fuel, diesel and fuel oil and the test methods behind them, then how each property blends: linearly, through blending indices or with interaction effects. Octane, vapour pressure, distillation, sulphur, cetane, cold flow and density are all worked through in blend calculations. Inline and batch blending systems, online analysers and recipe control follow, together with additives and dyes. National specifications, including SANS fuel standards and harmonised East African standards, are compared with European norms. Blenders and quality staff leave able to plan a blend that meets specification at lowest cost with minimum giveaway.

What you will learn

- Explain the specifications that govern gasoline, jet, diesel and fuel oil
- Interpret the test methods behind each quality property
- Calculate blend properties using linear and index blending methods
- Optimise a blend recipe for cost while meeting all limits
- Specify inline and batch blending systems and online analysers
- Select additives for octane, cetane, lubricity and cold flow
- Reduce quality giveaway through tighter blend control
- Investigate off specification product and plan a corrective reblend

Who should attend

- Blending and oil movement supervisors
- Laboratory managers and quality chemists
- Refinery planners and product schedulers
- Fuel importers and terminal quality staff
- Regulators enforcing fuel quality standards

Course outline

- 01 Fuel specifications and their purpose
- 02 Quality test methods
- 03 Gasoline blending: octane and vapour pressure
- 04 Middle distillate blending: cetane and cold flow
- 05 Fuel oil and marine fuel blending
- 06 Blending systems and analysers
- 07 Additives and dyes
- 08 Giveaway, rebends and quality release

Upcoming dates



Dates	Venue	Format	Fee per delegate
26 to 30 October 2026	Online	Online	R8,500
30 November to 4 December 2026	Nairobi, Kenya	Classroom	USD 1,325
1 to 5 February 2027	Dar es Salaam, Tanzania	Classroom	USD 1,325
1 to 5 March 2027	Maseru, Lesotho	Classroom	R19,950

Fees and how to register

This 5 day course is **R8,500** per delegate online, **R19,950** in the classroom in South Africa, Botswana, Namibia, Lesotho and Eswatini, and **USD 1,325** in the classroom elsewhere in Africa. In-house training is quotation on request. Book 2 or more delegates on this course and save 10%.

To register or request an in-house proposal, visit www.afrisciencegroup.com, email info@afriScience.co.za, or WhatsApp us on **+27 63 479 1136**.

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