Performance of the Prototype Gas Recirculation System with built-in RGA for INO RPC system

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An open loop gas recovery and recirculation system has been developed for the INO RPC system. The gas mixture coming from RPC exhaust is first desiccated by passing through molecular sieve (3Å + 4Å). Subsequent scrubbing over basic active alumina removes toxic and acidic contaminants. The Isobutane and Freon are then separated by diffusion and liquefied by fractional condensation by cooling up to -26 ℃. A residual Gas Analyser (RGA) is being used in the loop to study the performance of the recirculation system. The results of the RGA analysis will be discussed.

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