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A Novel Multi-Period Mixed-Integer Linear Optimization Model for Optimal Distribution of Byproduct Gases, Steam and Power in an Iron and Steel Plant

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Highlights

- Novel multiperiod MILP model for optimal distribution of byproduct gases, steam and power
- Correct modeling of burner switches with fewer binary variables allowing turning on/off at a time
- Introduce key practical features in byproduct gas, steam and power generation and distribution
- Reduce total operating cost by 6% compared to that from the real operation

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