

to energy management over the past decades has led to a lack of coordination between sectors such as industry, agriculture, and energy, and that efforts like forming the Supreme Energy Council have also fallen short. Fasihi took issue with policy instability and the absence of a long-term outlook and said that tough decisions were often put off, which had resulted in major economic opportunities slipping through the cracks both domestically and internationally. According to him, reliance on fossil resources and neglect of new energies are among the main weaknesses in Iran's energy governance. He pointed out structural problems in the energy sector to underline the need for macro-level policy reform and integrated management. The union leader criticized the siloed approach and policy instability. "Reliance on fossil resources and neglect of new energies are among the main weaknesses in Iran's energy governance." The president also referred to high household energy consumption and the impact of sanctions on the economy and called for the creation of integrated management structures, a focus on long-term policymaking, managing energy consumption

through advanced technologies, and reforming subsidy policies.

Iran's economy, energy sector require fundamental reform

Hamidreza Salehi, a member of Iran's Chamber of Commerce, also spoke out against the state of economic governance, calling for sweeping reforms in economic policy and energy management. He believes that without fundamental changes at the highest decision-making levels, the country's current economic woes will not be sorted out. Salehi said that government intervention in the economy, especially in electricity and energy pricing, had held back private sector investment. He further underscored the need for transparency in government-citizen relations, reforming governance structures, creating investment security, and robust support for the private sector. Noting that the government treated renewables as a "luxury item," he said that "getting out of the energy deficit crisis hinged on changing such a mindset and paving the way for energy production using clean and renewable sources."

Strategy for value creation in production

Kamran Yeganegi, a university



Engineers discuss matters in the Hengam gas condensate refinery in the Qeshm island, southern Iran. MEHR

faculty member, also called for energy rebalancing as a strategy for turning challenges into economic opportunities. Yeganegi said that implementing policies based on consumption optimization and balancing supply and demand was the key to boosting productivity and competitiveness in production, and that energy should be seen not as a costly burden, but as a capacity for sustainable growth and devel-

opment. He put forward solutions such as optimizing energy use in energy-intensive industries, expanding renewables, and digitizing the energy chain as effective strategic priorities. The professor argued that leveraging advanced technologies like heat recovery, low-consumption burners, and smart energy management systems could go a long way toward reducing energy use

and ramping up output efficiency. He emphasized the importance of rolling out small-scale solar power plants in industrial parks and the need to come up with innovative energy management models, adding that countries like Denmark, Germany, and Turkey have been held up as successful examples of energy rebalancing. "Denmark, by developing wind turbine technology, has managed

to boost both domestic supply and export capacity. Germany, by cutting fossil energy consumption and offering targeted incentives to industries, has shored up industrial production and energy efficiency. In Turkey, structural reforms and attracting private sector participation in energy have helped the country carve out a role as a regional energy player."

Urgent need to reform ongoing practices

Experts and academics present at the session agreed that the energy shortfall stemmed from structural, managerial, and policy-level problems and called for a comprehensive and systematic approach to tackle it. Improving power plant efficiency, investing in renewables, reforming pricing and subsidy policies, managing energy consumption, strengthening energy diplomacy, and creating integrated management structures are among the solutions put forward by these experts to pull the country out of the energy deficit crisis. It appears that immediate and coordinated action on these fronts is crucial to ward off even more serious consequences for Iran's economy and industry.

The article first appeared in Persian on IRNA.

South Pars on new course to tackle output challenges, beat rival

PERSPECTIVE

Qatar got a head start on Iran by beginning natural gas extraction from South Pars, the world's largest gas field, years earlier and has now geared up to boost pressure at the shared field, sounding the alarm that within a few years, there may be no gas left for Iran. While Iran has recently caught up to Qatar's daily gas production level, reports indicate that gas output in South Pars has taken a hit due to unsustainable production practices, with the problem expected to be felt more acutely in the Iranian section. An assessment by Iran's National Development Fund lays out expectations that by 2033, a quarter of the country's total gas production will be scaled back due to a pressure decline in South Pars, which accounts for more than 70% of Iran's total gas output. To head off production decline, Iran is tasked with installing 10 to 15 platforms, each weighing 20,000 tons — 15 times the size of current platforms — equipped with massive compressors. The investment is estimated to cost \$35 billion. Meanwhile, Qatar has already been down this road for years. In March, Iran's Oil Ministry signed a \$20 billion contract with several domestic firms to build 28 platforms weighing 7,000 tons each, along with 56 compressors, as part of the pressure enhancement plan for South Pars. The move comes as Qatar had jumped on the need to compensate for the production decline much earlier. Until recently, well pressure in the Iranian section of South Pars had remained steady at an average of 210 bars. However, since 2023, pressure has dropped by 7 bars annually, resulting in a loss of 10 billion cubic meters per year. Notably, a significant decline in pressure has set in at Phase 12, the largest phase of South Pars, over recent years. Iran, in an effort to keep up production levels, brought online Phase 11 of South Pars in Au-

gust 2023 and launched extensive drilling operations. Moreover, in November 2023, the Oil Ministry inked a contract to drill 35 new wells with local companies. However, while increased drilling may shore up gas production in the short term, it is expected to speed up the pressure decline in the Iranian sector.

entered its dew point in 2023 and has been facing pressure drops, technical experts say that continuing gas production requires 20,000-ton pressure-boosting platforms and powerful compressors. The pressure enhancement project in the Iranian section of South Pars is planned across seven

Iranian Oil Company, these lighter platforms are still capable of meeting the pressure-boosting needs of the South Pars field and are considered appropriate. Since they can be built domestically, the weight reduction has also allowed for an increase in the number of platforms. Reports by the Oil Ministry and

700,000 barrels of condensate (ultra-light oil) daily from these four layers. Notably, Qatar's total condensate production over the past three decades has been double that of Iran. With Qatar's increasing production from this reservoir and Iran's declining output, it is predicted that gas reserves will gradual-

reaching 142 million tons by 2030. As a result, Qatar's total gas production from South Pars is expected to hit 740 million cubic meters per day by 2030, while Iran's production from this shared field is forecasted to drop by over 30% within a decade, falling to around 350 million cubic meters per day



The photo shows Qatargas 4, a fully integrated liquefied natural gas (LNG) asset with joint ownership by QatarEnergy (70%) and Shell (30%). SHELL

The only way for Iran to turn things around is by installing 20,000-ton platforms equipped with massive compressors — a technology locked up by Western companies. All 24 phases on the Iranian side are operational, leaving no room to launch new phases to boost production or offset declines elsewhere. Monitoring of gas production in South Pars shows that pressure decline in this shared field will step up to a serious level by 2026, and if the pressure enhancement project is not rolled out by then, gas extraction will become increasingly difficult. International reports indicate that Qatar caught wind of the issue years ago and signed up for pressure enhancement contracts to milk more gas from the shared field. Currently, over 70% of Iran's gas production comes from South Pars, making pressure decline a serious threat. Since South Pars

hubs, involving companies such as Petropars, OIEG, MAPNA, and Khatam al-Anbia Construction Headquarters. According to the Oil Ministry, implementing the pressure increase plan in South Pars demands a \$20 billion investment, which will raise gas extraction to 90 trillion cubic feet and condensate output to 2 billion barrels, generating about \$900 billion in revenue for the country. The new South Pars pressure enhancement contract, the largest gas contract in Iran's history, lays out the construction and installation of 28 new platforms, half of which will be dedicated to turbo compressors. Each platform will be capable of pumping up one billion cubic feet of gas under pressure. One of the key points in this contract is the shift from the originally planned 20,000-ton platforms to smaller 7,000-ton ones. According to the National

assessments from credible international organizations indicate that no serious action was taken to control the pressure decline, especially after Total pulled out of Phase 11 in 2018, which was supposed to install pressure-boosting platforms. These reports highlight several key reasons behind the decline in Iran's gas production after the completion of the South Pars development phases: the natural drop in reservoir pressure, a surge in household gas and electricity consumption, government subsidies that keep energy prices artificially low, the switch from liquid fuels to natural gas, and the rapid growth of petrochemical plants and other energy-intensive industries. As noted, the reservoir's inclination leans toward Qatar, with gas and condensate flows mainly heading out from Iran toward Qatar. Both countries currently produce between 650,000 and

ly shift over to Qatar. Furthermore, this field, located at a depth of one kilometer, contains several crude oil layers extending from Iran to Qatar, making it a shared asset between the two countries. Qatar began gas extraction from South Pars in 1990, a decade ahead of Iran, and has produced nearly twice the gas volume from this field. Nevertheless, Iran has launched 14 new phases over the past decade and recently caught up with Qatar's production level. In 2005, Qatar announced a halt to development at the North Dome field to size up the impact of rapid production increases on the reservoir. However, development resumed in 2022, and Qatar signed off on contracts worth \$29 billion with Western companies to boost production by 30% by 2026. The goal is to increase annual LNG export capacity from 77 million tons to 126 million tons per year, with projections

due to pressure decline on the Iranian side if the pressure-boosting projects are not completed. Despite the challenges laid out, it is clear that Iran's Oil Ministry is not standing idly by. With the signing of the largest gas contract in the country's history, a major step has been taken to revamp infrastructure and address the pressure decline in South Pars. By turning to domestic companies and reconfiguring the platform design to accelerate construction, the ministry has shown adaptability and determination to get the project off the ground. The launch of Phase 11, extensive drilling plans, and the push to install 28 new platforms and 56 compressors all reflect a proactive strategy aimed at sustaining gas production and safeguarding national energy security for years to come.

The article first appeared in Persian on Mehr news agency.