China's Environmental Regulations Updates and Trends -Case Studies

Presented By: Shanghai EHS Risk Solutions Co. Ltd.

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Environmental NOV Case Study and Key Law Enforcement Points



Criminal Law Amendment 11

Implemented since March 1st, 2021

- Whoever falls under any of the following circumstances shall be sentenced to fixed-term imprisonment of not less than 7 years and shall also be fined:
 - 1. discharging, dumping, or disposing of radioactive wastes, wastes containing infectious disease pathogens, or toxic substances in key protection areas determined in accordance with law, such as drinking water source protection areas, core protection areas of nature reserves, etc., where the circumstances are particularly serious;
 - 2. discharging, dumping, or disposing of radioactive wastes, wastes containing infectious disease pathogens, or toxic substances into important rivers and lakes designated by the state, where the circumstances are particularly serious;
 - 3. causing a large number of permanent basic farmlands to lose basic function or suffer permanent damage;
 - 4. causing serious injury or illness to many people, or serious disability or death.
- Those who commit the acts in the preceding paragraph and constitute other crimes at the same time shall be convicted and punished in accordance with the provision on a heavier punishment.



Case 1 on Crime of Environmental Pollution - Data Fraud and Over-limit Discharge in 4 Hebei Steel Mills, 47 People Sentenced

Source: Pengpai News dated Jan. 28, 2022

- It was found by the court that the 4 steel mills as Tangshan (one city in Hebei Province) Focused Units for Air Emission interfered with auto monitoring facility and forged auto monitoring data of air emission during their production in Mar. 2021, resulting in a large amount of over-limit SO₂ and NOx emitted which polluted the environment and put the public health in danger. 2 companies were charged with Crime of Environment Pollution.
- On Jan. 27, 2022, the main responsible persons of the units, direct in-charge persons and direct operation persons, 47 in total in these 4 companies, were sentenced ranging from 6 months to 18 months in prison with personal penalties. 2 companies with the Crime of Environment Pollution were sentenced to fine 4 million RMB and 7 million RMB respectively.





Illegal Disposal of 10,000 Tons of Hazardous Waste, An Extremely Serious Environmental Pollution Case

Source: Jiangxi Court Network

- It's found by the court that 7 persons in Jiangxi Province without Hazardous Waste Operation License rented 6 warehouses to illegally dis-assembly old/waste lead batteries to get lead boards by "crashing", and then rent 7 workshops to refine these boards to lead ingots for sale since the end of 2016. Up to Sept. 29, 2019, the air emission, wastewater and solid wastes generated from the dis-assembly and refinery processes were directly discharged to air, waterbody and soil, and pollute the environment by causing lead and arsenic significant over-limit in 645.92M³ soil and 2.899ton lead fume & 36.28ton SO₂ emitted into air, of which requires about 938,974.2 RMB for environmental remediation. The disposed old/waste lead batteries reached 140,000 tons.
- On Jan. 28, 2021, the 7 persons were sentenced ranging from 18 months to 42 months in prison respectively, and 6 of them borne the 938,974.2RMB remediation cost.



Illegal Disposal of Hazardous Wastes in Yangtse River Delta and 28 People Sentenced

- A Critical Cross-province Environment Pollution Case

Based on Voice of Zhejiang, 28
people were charged the Crime of
Environment Pollution, sentenced
ranging from 9 months to 53 months
respectively, and personally fined at
most 200,000 RMB. Those people
were prohibited to handle any
hazardous waste disposal within 5
years.

• This was a typical case to crossprovince crack down hazardous waste NOVs and crimes in 2021.



Illegal Disposal of Hazardous Wastes in Yangtse Delta and 28 People Sentenced - A Critical Cross-province Environment Pollution Case (con't)

It's found by the court that some of them operated plexiglass processing in Jiangsu, Anhui and Zhejiang Province. The liquid waste generated from plexiglass distilling, clearly known by them to be disposed through a qualified unit, was illegally sold to a small workshop without the qualification as an intermediate vendor in Zhejiang. From July 2018 to July 2020, this intermediate vendor sold the liquid waste to fuel vendors in Anhui after a simple treatment. Then, those fuel vendors mixed simple treatment. Then, those fuel vendors mixed it with other fuel oils and sold to asphalt mixing plants in Anhui as "Heavy Oil " for fuel burning, which caused air pollution during burning. It's identified that the liquid waste with initial price 300RMB per ton was processed and sold at final price 3000RMB per ton, which created a black supply chain for illegally handling the liquid waste across the three provinces. The amount of the disposed liquid waste reached more than 2000 tons with the value of ten millions RMB.





Ecological and Environmental Indemnity

 Since the nationwide trial of the ecological and environmental indemnity system in 2018, more than 9,800 ecological and environmental indemnity cases have been handled in various regions, involving an amount of more than 10.7 billion RMB.



Meili Paper Mill Tengger Desert Pollution Case - Ecological and Environmental Indemnity 200 Millions RMB

- Based on China News Agency on Nov. 25, 2021, Ministry of Ecology and Environment (MEE) published the ecological and environmental indemnity of Meili Paper Mill Tengger Desert Pollution Case, of which the amount was about 200 millions RMB, China 1st ecological and environmental indemnity case through cross-province joint consultation and judicial confirmation.
- From Aug. 2003 to June, 2007, the paper mill illegally dumped black sticky waste generated from paper making into Tengger Desert at the border area of Inner Mongolia and Ningxia, causing 14 plots of soil, groundwater and vegetation damaged.
- It's reported that the indemnity explored "One-time Contract, Implementation by Phase "Model. After the indemnity agreement was signed in Dec. 2020, the compensation was divided into 2 phases. Phase 1 was to conduct pollution investigation and remediation projects with the charged cost 44.23 millions RMB. Phase 2 is to conduct compensatory restoration, groundwater monitoring, risk management and control of the contaminated plots, management and protection of forest areas, assessment of ecological and environmental benefits etc. with the charged cost 159 millions RMB.





Typical Ecological and Environmental Indemnity Case | A Company Illegally Stacking Hazardous Wastes

- It's reported in Jan. 2019 that one material company in Zhejiang Province irregularly stacked a large amount of wastewater sludge, which was classified as hazardous waste, at a non-designated area within the site.
- After verifying its hazardous waste manifest and registration, the following violations were found:
 - Actual amount inconsistent with the registered amount
 - The actual amount of hazardous waste and temp storage area not manifested
 - The unit main environmental responsibility not fulfilled
 - The distill residual warehouse, sludge warehouse and stack shed put into use without ECIA
- The company was fined 500 Thousand RMB with immediate correction, and kick-off the ecological and environmental indemnity procedure. It's estimated that the contaminated soil was 536.61 tons with 720 thousand RMB remediation cost and 1.15 million RMB damage cost, plus 530 thousand RMB investigation and evaluation fee and 2.30 million RMB emergency disposal fee. The total ecological and environmental indemnity is 4.78 million RMB.





Typical Ecological and Environmental Indemnity Case | A Company Illegally Stacking Hazardous Wastes (con't)

Final Agreed Results

- 1) The indemnity process was kicked out in Mar. 2020, and the ecological and environmental indemnity agreement was signed between the company and EPB in Aug. 2020, of which the indemnity obligor would conduct remediation by itself and pass the acceptance approval within the due date, while paying for damage investigation and evaluation fees; if the remediation overdue, the indemnity obligor pays liquidated damages to the compensation right holder at the rate of 3‰ per day since the overdue date.
- 2) In Sept 2020, both sides applied for judicial confirmation to the court, and in Oct. 2020, the indemnity agreement was confirmed by the court.
- 3) Finally, the company remediated 536.61 ton soil, of which the effect was investigated and evaluated by a 3rd party to meet the remediation targets in Jan. 2021.



Ecological and Environmental Indemnity Case for A Company Illegal Wastewater Discharge in Beijing Source: The 2nd Batch of Top 10 Ecological and Environmental Indemnity Cases



- <u>Finding</u>: During the enforcement inspection in May 2018, it's found that a company discharged over-limit wastewater to the local irrigation canal, causing a significant impact to the local ecology and environment. The company was fined 500 thousand RMB in April 2019.
- <u>Investigation</u>: It's estimated by a 3rd party that the indemnity caused by illegal discharge to the local irrigation canal was 19.5672 million RMB in Dec. 2018.
- <u>Consultation</u>: After several rounds of consultation, both sides made and sign an indemnity agreement in April 2020. The agreement stated that the company agreed to pay for wastewater discharge and WWTP modification project, including a new discharge pump station, 764.2-meter sewage pipe, connection with the municipal sewage system, while the WWTP was modified by adding 135-meter pipe to connect with the discharge pump station, and the discharged wastewater to the municipal sewage system would meet surface water discharge limits after the modification.
- Remediation: The remediation project was kicked off in Nov. 2019 and completed in Jan. 2020, of which the total investment was 29.5 million RMB, and the ecological and environmental indemnity was done as an "Alternative Repair" Model.



Focus for Environmental Regulations Enforcement

- The supervision and enforcement positive list shall be combined with the establishment of an environmental credit system to promote a differentiated enforcement and supervision;
- Explore the use of government public procurement to entrust 3rd party social institutions to assist enforcement, and use 3rd party services to strengthen the use of technical supports, such as remote sensing, massive data analysis etc., for accurate detection of violation issues;
- Implement a reporting and reward system for ecological and environmental violations;
- Create a catalogue of comprehensive enforcement matters for ecology and environment protection;
- Create a catalogue and rules of discretionary guidance on environmental penalties issued by the state and local governments to clarify the scope of responsibilities and enforcement boundaries of relevant departments in administrative enforcement matters;
- Implement a corporate environmental credit rating and information disclosure system;
- Encourage to explore a regional unified discretionary standard within Beijing-Tianjin-Hebei, Yangtze River Delta, Chengdu-Chongqing regions.





2021 Overview of Environmental Penalty Cases with Implementation of Supporting Measures of Environmental Protection Law Published by MEE

Environmental Penalty Case Summary

- Within 2021, the penalty cases were 132.8 thousands and the total penalty amount reached 11.687 billions RMB (which equals 88 thousands RMB per case).
- Top 5 provinces for penalty cases were Hebei, Jiangsu, Guangdong, Shandong and Henan,
- Top 5 provinces of penalty amount were Shandong, Guangdong, Jiangsu, Hebei and Zhejiang.

Implementation of Supporting Measures Summary

- Within 2021, the total number of 5-type cases were 15,454, of which the cases of consecutive penalty on day-to-day basis were 199 with penalty amount 185.8062 millions RMB; the cases applicable to seizure and detention were 8,897; the cases applicable to production limit and suspension were 1,093; the cases of transfer to criminal detention were 3,397; the cases of transfer to suspected environmental pollution crime were 1,868.
- Top 5 provinces with number of 5-type cases were Jiangsu, Guangdong, Anhui, Zhejiang, Hebei.
- Top 10 cities with number of 5-type cases were Dongguan, Xuzhou, Hefei, Taizhou, Changzhou, Nantong, Fuyang, Bozhou, Handan, Wuxi.



Solid Waste NOV Case Accurately Identified by UAV in Dalian

The 1st Batch of Typical Enforcement Cases (through Optimized Enforcement Ways) in 2022 by MEE

Overview

On June 30, 2021, it's found by local EPB that Industrial solid wastes, such as water slag and tailings were stored outdoors within the site of a steel mill in Dalian. Due to stack area and amount huge, UAVs were used by enforcement personnel to take pictures for evidence. After figure analysis, area measurement and information verification to identify total 22 areas for industrial solid waste stacking within the site. The enforcement personnel immediately carried out ground inspections one by one, and found that there were no diversion channels and leachate collection and drainage facilities in the three steel mill tailings slag yards, occupying 6,883M², 2,586M² and 6,795M² respectively, located in the south of the site, which did not meet GB18599-2001 requirements. In the face of the evidence, the company responsible person agreed to stack 100 thousand tons of industrial solid wastes on site.







Solid Waste NOV Case Accurately Identified by UAV in Dalian (con't)

- NOV Penalty
 - The steel mill violated 《Solid Waste Pollution Prevention and Control Law》 and 《Dalian Municipal Ecological Environment Administrative Penalty Discretion Benchmark System》, and was fined 1 million RMB with immediate correction of NOV.



The Air Emission Odor Concentration 72,443 and Fined

- A Chengdu Food Oil Company Over-limit Air Emission Case
- On Sept. 11, 2021, a Chengdu food oil company was inspected and monitored air emission by an entrusted 3rd party testing institution. The results showed that the odor concentration was 72,443 (dimensionless) vs. the limit of 2,000, which was 35.2 times.
- It violated 《Air Pollution Prevention and Control Law》, and was fined 651.2 thousand RMB.



A Foshan Company Using Paints Without Following Approved EIA and Fined 164 Thousands RMB

- <u>Case Description</u>: Foshan EPB inspected a coating company and found that the company was not using water-based paints with low VOC contents, which was specified in their approved EIA.
- The entrusted 3rd party testing unit monitored the paints to be coated. The results showed that the paints used were not categorized in the Low VOC Content, which was not matched with their approved EIA, and violated 《Air Pollution Prevention and Control Law》.
- NOV Result: On Oct. 26, 2021, the company was fined 164 thousand RMB based on 《Air Pollution Prevention and Control Law》。







Hazardous Wastes Stacked Outdoor with Plastic Board Barricading Fined 620 Thousand RMB

- On May 19, 2021, Zhejiang Province EPD inspected a Shaoxing new material company, and found that more than 2,000 drums (including plastic totes and metal drums) stacking at the east of the site, of which more than 900 drums contained semi-finished goods or raw materials. Also, some dismantled piping and equipment (de-coned) and waste PU foam were stacked, and more than 10 damaged material drums were stacked at the corner as well.
- After investigation, it was an open yard with floor hardening measures and stormwater collected to wastewater sewage system. Since 2018, the company started to stack various materials outdoor at the east space as an open yard. The yard was barricaded by plastic boards, which was quite under-covered.

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Hazardous Wastes Stacked Outdoor with Plastic Board Barricading Fined 620 Thousand RMB (con't)

- After investigation through a 3rd party technical unit, there were 1.41 tons of HW49 hazardous wastes, of which the HW code was 900-041-49 and the HW property was toxic, stacking in the yard. On May 26, the company had these hazardous wastes disposed by a qualified unit with disposal cost 18 thousand RMB.
- NOV Results: The new material company violated 《Solid Waste Pollution Prevention and Control Law》, and was fined 620 thousand RMB on June 21, 2021.







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Investigation on Soil Contamination NOV Case in Nantong

【Case Description】

On Aug. 5, 2021, Nantong EEB inspected a land, which was acquired by a harbor company in July 2017, and previously owned by a nickel refinery company. It's found that the land was contaminated and needed remediation after a detail investigation and risk control assessment with a detail report conducted by the harbor company in Nov. 2018. On Dec. 23, 2019, this land was Included in the "Jiangsu Province Construction Land Soil Contamination Risk Control and Remediation List (First Batch) " . In June 2020, the harbor company leased this land to a 3rd party for a construction project of cement container unloading and cement tanker loading without getting province level approval on the land remediation.

Investigation on Soil Contamination NOV Case in Nantong (con't)

[NOV Result]

The harbor company violated 《Soil Contamination Prevention and Control Law》, and was fined 144 thousand RMB for the company and 8 thousand RMB for the unit main responsible person.

Art.66 Construction land plots that have not reached the risk control and restoration goals determined in the soil pollution risk assessment report are prohibited from starting construction of any projects unrelated to risk control and restoration.



The "14th 5-year Plan" Key Enforcement Points for Ecology and Environment

- Adhere to the same direction and unabated efforts, highlight accurate, scientific and law-based pollution control.
- Focus on improving the system and mechanism, continue to deepen the system reform on law enforcement, and actively build a fixed pollution source supervision & law enforcement system by the core of Pollutant Discharge Permit System.
- Continue to maintain a high-tension of strict law enforcement, solidly enhance supervision and law enforcement in key areas, effectively strengthen the supervision of 3rd party environment institutions, and firmly establish the authority and seriousness on law enforcement.
- Help to fight for the breakthrough of pollution prevention & control, continue to strengthen the breakthrough of key tasks, consolidate the responsibilities of all parties, and continue to improve ecology and environment quality.
- Focus on changing method & improving efficiency, standardize law enforcement actions throughout the process, fully implement mobile system application during law enforcement, expand off-site supervision methods, and improve the level of intelligent supervision on standardized law enforcement.





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