

Representative Melissa G. Ballard proposes the following substitute bill:

**CONCURRENT RESOLUTION REGARDING IMPROVING AIR
QUALITY THROUGH ENHANCED ZERO EMISSION RAIL**

2022 GENERAL SESSION

STATE OF UTAH

Chief Sponsor: Melissa G. Ballard

Senate Sponsor: David P. Hinkins

LONG TITLE

General Description:

This concurrent resolution addresses improving air quality through encouraging rail development and zero emission technology deployment.

Highlighted Provisions:

This resolution:

- ▶ addresses air quality and its impacts in the state;
- ▶ describes solutions to reduce air pollution;
- ▶ describes the rail transportation impact on air quality;
- ▶ acknowledges the role of certain governmental agencies in the shift of freight traffic

to rail;

- ▶ highlights that technology solutions, including information and communications technology and zero emission locomotives, can further reduce rail emission

impacts;

- ▶ addresses funding and innovative procurement solutions;
- ▶ encourages the phased replacement of existing locomotives used in railroad and

industrial plant switching services in nonattainment areas in the state with zero emission locomotives; and



26 ▶ encourages the transition of rail transportation in general to zero emission
27 locomotives.

28 **Special Clauses:**

29 None

30

31 *Be it resolved by the Legislature of the state of Utah, the Governor concurring therein:*

32 WHEREAS, Utah continuously demonstrates the state's commitment to and interest in
33 the state's air quality;

34 WHEREAS, good air quality is a vital component of the economy and human health in
35 Utah and research conducted by Utah universities shows the harmful impacts of air pollution
36 on human health, with the greatest negative impact on the health of children, the elderly, and
37 those with compromised immune systems;

38 WHEREAS, for example, exposure to direct small particulate matter exacerbates
39 asthma, increases the risk of cancer, and leads to acute respiratory symptoms, bronchitis,
40 chronic obstructive pulmonary disease, heart attacks, nervous system effects, lost work days,
41 and premature death;

42 WHEREAS, there is now a broad range of technologically and economically viable
43 solutions to significantly reduce air pollution and ensure that future economic and population
44 growth does not compromise air quality;

45 WHEREAS, embracing zero emission technologies will help grow our state's robust
46 clean technology sector;

47 WHEREAS, as of 2017, railroad transportation contributed 9.2% of NOx and 1.4% of
48 the PM2.5 along the Wasatch Front;

49 WHEREAS, while comparable data is not available for the trucking sector or all freight
50 railroad operations in the state, as of 2017 the Division of Air Quality found that locomotives
51 used for short line, industrial plant, and switch engine operations contributed 3.4% of NOx and
52 0.16% of PM2.5 of the total Wasatch Front inventory of emissions, equivalent to
53 approximately 1,828 tons of NOx and 19 tons of PM2.5;

54 WHEREAS, in addition to significant numbers of heavy haul freight locomotives
55 operating in and through the state, as of 2017 there were approximately 63 short line
56 locomotives, industrial plant locomotives, or switch engines operating in Utah;

57 WHEREAS, the majority of the short line locomotives, industrial plant locomotives,
58 and switch engines operating in Utah are legacy platforms certified to the United States
59 Environmental Protection Agency as meeting Tier 0 or Tier 0+ emission standards, and almost
60 all emissions from these locomotives occur within two of Utah's PM2.5 nonattainment areas
61 based on the United States National Ambient Air Quality Standards;

62 WHEREAS, under the federal Clean Air Act, an area where air pollution levels
63 persistently exceed a National Ambient Air Quality Standard may be designated as a
64 "nonattainment" area by the United States Environmental Protection Agency;

65 WHEREAS, designation as a nonattainment area requires the development of a State
66 Implementation Plan with increasing mandatory requirements if the area does not return to
67 attainment within prescribed timelines, and may result in the imposition of a Federal
68 Implementation Plan and sanctions that could impact the availability and use of federal
69 highway funds;

70 WHEREAS, the Utah Department of Transportation, other agencies of the state, and the
71 Utah Inland Port Authority, a political subdivision of the state, can play a vital role in
72 accelerating the modal shift of freight traffic to rail, helping to meet health and air quality
73 goals;

74 WHEREAS, the Utah Inland Port Authority anticipates assisting in the reduction of
75 trucks from the road and the modal shift to rail, while using the regulatory sandbox to test new
76 freight movement and cargo handling equipment at the inland port to increase use of zero
77 emission vehicles;

78 WHEREAS, to complement accelerating this modal shift to rail, a broad spectrum of
79 technologies, including information and communications technologies that enable more
80 efficient rail operation reducing fuel use and emissions, and entirely new locomotive power
81 technologies such as hydrogen fuel cell-electric and battery-electric, must be encouraged and
82 supported to further decrease total freight section emissions, including freight rail emissions;

83 WHEREAS, funding support and innovative procurement solutions made available
84 through the Utah Department of Transportation and the Utah Inland Port Authority can assist
85 private sector operators of short line locomotives, industrial plant locomotives, and switch
86 engines with transitioning to zero emission technologies, including for freight rail, that can
87 materially increase the state's air quality; and

88 WHEREAS, substantial federal funding is expected to be available to support this
89 transition, and the Utah Department of Transportation and the Utah Inland Port Authority
90 should maximize their efforts to secure the federal funding to facilitate deployment of zero
91 emission technologies, including freight rail, that can materially increase the state's air quality:

92 THEREFORE, BE IT RESOLVED that the Legislature of the state of Utah, the
93 Governor concurring therein, encourages the introduction of new zero emission locomotives
94 operated by short line locomotives, industrial plant locomotives, and switch engines in
95 nonattainment areas, a continued shift of freight transportation growth to rail to help meet the
96 state's air quality goals, phasing out legacy locomotive engines in short line, industrial plant,
97 and switch engine rail service in nonattainment areas in the state, and phasing in the use of zero
98 emission engines to 100% use by short line locomotives, industrial plant locomotives, and
99 switch engines by 2050.

100 BE IT FURTHER RESOLVED that the Legislature and the Governor encourage, in
101 addition to short line locomotives, industrial plant locomotives, and switch engines all rail
102 transition to zero emission technologies, including commuter rail, passenger rail, and long haul
103 freight rail.