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# Surgical Smoke Evacuation Policies

Bill 4011, introduced to the House, proposes required surgical smoke evacuation system policies and penalties for health care employers that violate requirements

## Background

Surgical smoke is created by the use of lasers and electrosurgical units required for certain medical procedures and creates health hazards to personnel required to be near the smoke generation, including anesthesia providers (Mohd & Titi, 2019). Inhalation of surgical smoke can cause inflammation and permanent lung injury, inhalation of carcinogens, and possible transmission of transmissible diseases (Mohd & Titi, 2019). A dedicated smoke evacuation system is the most effective method of protection against surgical smoke exposure (Mohd & Titi, 2019).

In a study performed by Mohd & Titi (2019), as high as 60% of staff in the operating room experienced an acute negative health effect from exposure to surgical smoke, including:

- Upper airway irritation
- Eye irritation
- Asthma-like symptoms
- Headache

### Discussion

- According to the CDC (2020), recommendations for control of surgical smoke exposure were created by NIOSH in the late 1990's.
- Despite the evidence of hazardous occupational exposure and subsequent recommendations, over 500,000 health care workers are still being exposed each year to surgical smoke (Ogg, 2020)
- This proposed bill will hold employers accountable for protecting their employees from known occupational hazards that could create lasting negative health consequences.

## Recommendations

Based on the evidence that surgical smoke poses significant risks to those who are exposed to it and the reluctance of organizations to provide adequate safety measures, **it is imperative that this proposed bill** 

#### be passed in the House.

This proposed bill has the required components to improve the working conditions in the operating room through:

- Clearer language on what is required to create safe working environments- smoke evacuation systems are the most reliable method
- Responsibility placed on the health care facilities
- Accountability through penalties outlined in statute 182.666

With the growing demand for health care services, action must be taken to protect current health care workers from unnecessary occupational exposure.

#### References

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