

**201-7 Signing for Engine Brake Restrictions (R16-H4, R16-H5, R16-H13, R16-H14)**

An engine brake is a device used on vehicles, principally large trucks, that changes the timing of the exhaust valves to slow the vehicle. The engine brake is used instead of, or in addition to, the friction brakes and produces an audible “popping” noise that is sometimes perceived as objectionable.

The slang term “Jake Brake” is sometimes used to refer to engine brakes in general. However, this term is a registered trademark of **Jacobs Vehicle Systems**, a major manufacturer of engine brakes. Since this term actually refers to all of **Jacobs Vehicle Systems** retarding products and is brand specific, it should not be construed as being equivalent to “engine brake,” and should not be used on highway signing.

The **Ohio Office of the Attorney General** has determined that, pursuant to **ORC Sections 505.17(A) and 4513.221(E)(4)**, a **Board of County Commissioners** or **Township Trustees** may enact a regulation prohibiting the use of engine brakes on vehicles within the unincorporated area of the **County** or **Township**. This includes **ODOT**-maintained highways within the boundary of the **County** or **Township**, as well as **County** and **Township** Roads.

**Section 4917 of the United States Code** is part of the **Noise Control Act of 1972**, and sets maximum noise emissions for motor carriers engaged in interstate commerce. According to an opinion issued by the **Ohio Office of the Attorney General**, local regulations restricting the use of engine brakes to control noise for motor carriers engaged in interstate commerce “may be inconsistent with federal law, and thus preempted and unenforceable.” For this reason **ODOT** will not install **NO ENGINE BRAKE** signs (R16-H4) on the mainline and ramps of Interstate Routes.

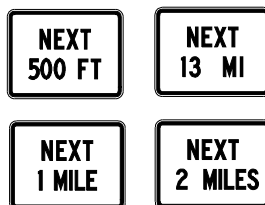
The **NO ENGINE BRAKE** sign (R16-H4) shall be used where the use of engine brakes has been restricted by the proper resolution per the **ORC**. The R16-H13 and R16-H14 auxiliary plates may be used to indicate specifics regarding when or where the restriction applies, and may be combined with the R16-H4 sign on a single panel. Sample legends for these plates are “6 PM - 6 AM” for the R16-H13 and “NEXT ½ MILE” or “NEXT 500 FT” for the R16-H14. The **END ENGINE BRAKE RESTRICTION** sign (R16-H5) may be used to indicate the terminus of the restriction.

For a **Township** restriction, typically only one **NO ENGINE BRAKE** sign (R16-H4) in each direction of travel within the **Township** should be installed on a state highway. More than one sign in each direction of travel may be needed for a countywide restriction, based on the length of the route within the **County**. The signs should be placed at strategic locations where the use of engine brakes has been a problem, such as at the beginning of a downgrade or an approach to an intersection. Alternatively, signs may be placed near where the state highway enters the **County** or **Township** or where a state highway begins within a **County** or **Township**. Overuse of signing should be avoided.

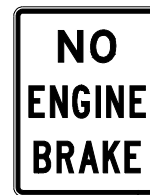
When a **County** or **Township** has passed a resolution restricting the use of engine brakes pursuant to **ORC Sections 505.17(A) and 4513.221(E)(4)**, **ODOT** will install signs on the rural state highway system indicating such a restriction. The **County** or **Township** is responsible for furnishing all signs to **ODOT**. The signs shall be fabricated in accordance with **ODOT** design standards and material specifications. **ODOT** will supply the sign supports and necessary hardware.



R16-H13



R16-H14



R16-H4



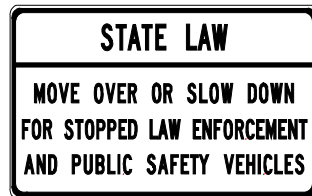
R16-H5

| Code No.       | Route Type   | Size Inches (millimeters) |
|----------------|--------------|---------------------------|
| R16-H4, R16-H5 | Conventional | 24 x 30 (600 x 750)       |
| R16-H13        |              | 24 x 8 (600 x 200)        |
| R16-H14        |              | 24 x 18 (600 x 450)       |
| R16-H4, R16-H5 | Expressway   | 36 x 48 (900 x 1200)      |
| R16-H13        |              | 36 x 12 (900 x 300)       |
| R16-H14        |              | 36 x 24 (900 x 600)       |
| R16-H4, R16-H5 | Freeway      | 48 x 60 (1200 x 1500)     |
| R16-H13        |              | 48 x 16 (1200 x 400)      |
| R16-H14        |              | 48 x 30 (1200 x 750)      |

**201-8 Move Over or Slow Down Signs (R16-H15)**

R16-H15 signs were installed at 75 locations on **ODOT**-maintained highways in 2000. These signs were installed at the request of the **Ohio State Highway Patrol (OSHP)** to publicize the provisions in **House Bill 86** which enacted **ORC Section 4511.213**, requiring that a driver approaching a stationary public safety vehicle displaying its emergency flashers proceed with due caution and either move over or slow down.

The **OSHP** provided funding for initial sign fabrication, and the **Districts** provided the materials and labor for installation. However, no funding has been provided by **OSHP** to cover fabrication costs of signs needed for maintenance replacements. The **Districts** should order and install replacement signs as needed using established procedures.



R16-H15  
120" x 60"  
(3000 mm x 1500 mm)

**201-9 Truck Restrictions in Municipal Corporations**

A municipal corporation may restrict truck traffic on State or U.S. Routes through the municipal corporation only by regulating weight limits on the route, and only with the approval of the **Director of Transportation**.

A municipal corporation can regulate the use of its streets and can restrict the type of vehicles that travel over those streets pursuant to **ORC Section 4511.07**. However, **ORC Sections 4511.06 and 4513.33** restrict the use of that power for trucks traversing designated State or U.S. Routes. Thus, a municipal corporation may establish its own truck weight limits for streets and highways within its jurisdiction that differ from those established in **ORC Chapter 5577** and must post signs notifying the traveling public. However, when such weight limits involve an **ODOT**-maintained highway, **ORC 4513.33** requires the approval of the **Director** to alter them. Otherwise, the ordinance may conflict with **ORC Sections 4511.06 and 4513.33** and be found ineffective.