



Traction Power Substation FAQ

What is a Traction Power Substation (TPSS)?

A TPSS provides electrical power to the streetcar motors through the Overhead Catenary System (OCS).

How many substations are needed along the H/Benning Corridor?

Providing power to the vehicles requires three substations to be placed along the H/Benning corridor. The Western substation will be under the Hopscotch Bridge and inaccessible by the public, while the Eastern substation will be on the grounds of the Car Barn Training Center, in a secure area. Only the Midline Substation on District right-of-way at the southwest corner of 12th/H Streets NE will be seen by the public.



Are they safe?

Substations are completely safe and fully enclosed. They do not emit radiation or any other harmful pollutants.

Are they noisy?

Noise from a TPSS can best be described as a quiet, dull hum. You can only hear the TPSS operate if you are standing right beside it.

Do they run 24/7?

Substations only run when the streetcars are in service, so they do not operate 24/7.

How was the design for the Midline Substation created?

Architects on the DC Streetcar Team went through a design process with the Commission of Fine Arts (CFA) and ANC6A to achieve the final design, which was officially approved by the CFA on May 16, 2013. The goal of the design was to blend as much as possible with the neighboring building (Khan’s Bar and Grill) and provide opportunities for local art and plantings.

Is the Midline Substation permanent?

DDOT is working with the developer of the AutoZone property to move the TPSS across 12th Street to the parcel currently occupied by AutoZone, once the property re-develops. At that time, we plan to incorporate the substation into the new development, taking it out of public view.