Tower Bridge

A100 Tower Bridge Road – motor vehicles, cyclists, pedestrians

| Crosses | <u>Thames</u> |
|-----------------|---|
| Locale | <u>London</u> Boroughs: – north side: <u>Tower Hamlets</u> – south side: <u>Southwark</u> |
| Maintained by | Bridge House Estates |
| Design | <u>Bascule bridge</u> , <u>suspension bridge</u> |
| Total length | 244 metres (801 ft) |
| Longest span | 61 <u>metres</u> (200 <u>ft</u>) |
| Clearance below | 8.6 metres (28 ft) (closed) 42.5 metres (139 ft) (open) (Mean High Water Spring Tide) |
| Opened | 30 June 1894 |
| Heritage status | Grade I listed structure |

Carries









Tower Bridge during day

Tower Bridge at night

Tower Bridge area from the air

Tower Bridge seen from the north bank of the Thames



South view at dusk



Close-up of walkways, illuminated at dusk



Close-up of opened bascules



The south tower, showing pier at river level



History Background

In the second half of the 19th century, increased commercial development in the East End of London led to a requirement for a new river crossing downstream of London Bridge. A traditional fixed bridge could not be built because it would cut off access to the port facilities in the Pool of London, between London Bridge and the

Construction

Tower Bridge under construction, No. Construction started in 1886 and took eight year with five major contractors – <u>Sir John Jackson</u> (foundations), <u>Baron Armstrong</u> (hydraulics), <u>William Webster</u>, Sir <u>H.H. Bartlett</u>, and <u>Sir William</u> <u>Arrol & Co.</u>– and employed 432 construction workers. E W Crutwell was the resident engineer fo the construction.

Two massive piers, containing over 70,000 tons of concrete, were sunk into the riverbed to support the construction. Over 11,000 tons of steel provide the framework for the towers and walkways. This was then clad in <u>Cornish granite</u> and <u>Portland</u> stone, both to protect the underlying steelwork and to give the bridge a pleasing appearance. Jones died in 1887 and George D. Stevenson took over the project. Stevenson replaced Jones' original brick facade with the more ornate Victorian Gothic style, which makes the bridge a distinctive landmark, and was intended to harmonise the bridge with the nearby Tower of London. The total cost of construction was £1,184,000 (£100 million a of 2010).





 The bridge was officially opened on 30 June 1894 by The Prince of Wales (the future <u>King Edward VII</u>), and his wife, The Princess of Wales (<u>Alexandra of Denmark</u>).

Opening

The bridge connected Iron Gate, on the north bank of the river, with Horselydown Lane, on the south – now known as Tower Bridge Approach and <u>Tower Bridge Road</u>, respectively.Until the bridge was opened, the <u>Tower Subway</u> – 400 m to the west – was the shortest way to cross the river from <u>Tower Hill</u> to <u>Tooley Street</u> in <u>Southwark</u>. Opened in 1870, Tower Subway was the world's first underground ('tube') railway, but closed after just three months and was re-opened as a pedestrian foot tunnel.

ALL STREET

Tower Bridge is one of five London bridges now owned and



- The bridge is 800 <u>feet</u> (244 <u>m</u>) in length with two towers each 213 feet (65 m) high, built on piers. The central span of 200 feet (61 m) between the towers is split into two equal bascules or leaves, which can be raised to an angle of 83 degrees to allow river traffic to pass. The bascules, weighing over 1,000 tons each, are counterbalanced to minimize the force required and allow raising in five minutes.
- The two side-spans are suspension bridges, each 270 feet (82 m) long, with the suspension rods anchored both at the abutments and through rods contained

Facts

 "1912 - Frenku Makklinu (Frank) McClean) happened to staired between stairwell and passage high level bridge on its biplane to avoid the accident. "1952 - once upon a time bridge have unexpectedly begun to divorce, and london bus, found on bridge, was have to make 'jump with one stairwell on

 "1977 - a bridge was painted in red, white and blue colour in



THANK YOU FOR ATTENTION

