LAUNCESTON IS WELL SERVED BY PUBLIC TRANSPORT, BUT A CAR WILL BE REQUIRED TO EXPLORE LANEAST

PLEASE PARK RESPONSIBLY IN LANEAST VILLAGE

#### LAWRENCE HOUSE

9 Castle Street, Launceston PL15 8BA Open April - October 01566 773277

#### LIBRARY

1 Bounsall's Lane, Launceston PL15 9AB Open Tues-Sat (am) 0300 123 4111

#### WRITTEN AND COMPILED BY

Carolyn Kennett (FRAS) and Brian Sheen (FRAS) as part of the Dark Skies: Bright Stars project with Mayes Creative.

#### **IMAGE CREDITS**

National Portrait Gallery (Two portraits of Couch Adams)

NASA (Image of Neptune & Cover)

Carolyn Kennett

Ethel Roseveare via Rosemary Pritchard Image of Greenwich Meridian)



This is a self-guided trail, set in and around the town of Launceston, Cornwall.

It will take you on a journey through the famous life of John Couch Adams, Mathematician, Astronomer and Cornishman.

Couch (pronounced Cooch) Adams was born on 5th June 1819 at Lidcot Farm, Laneast, six miles West of Launceston.

He was the eldest child of Tennant farmers, Thomas Adams and Tabitha Knill Grylls. Schooled locally until the age of 12, Couch would become one of the foremost, leading mathematicians and astronomers in the 19th century.





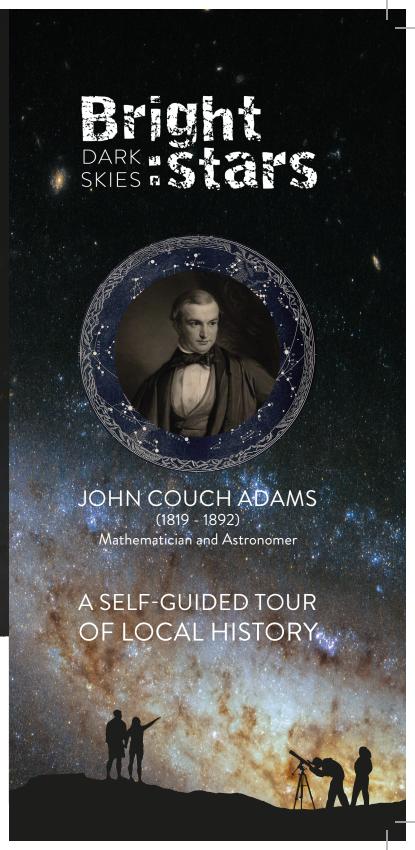
Supported By:











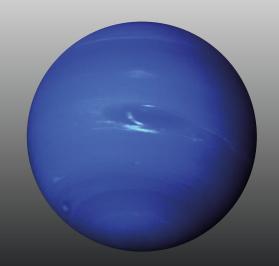
### **DISCOVERY OF NEPTUNE**

John Couch Adams became famous in his mid 20s having mathematically shown that there was another planet orbiting the Sun.

At a similar time, the planet, Neptune, had also been calculated by fellow mathematician, Le Verrier of France.

Le Verrier would share his data with German astronomer Galle who went on to discover Neptune, causing much controversy over who did, in fact, discover it.

Interestingly, Couch, known as a kind and gentle soul, was aware of this controversy and always gave credit and precedence to Le Verrier.



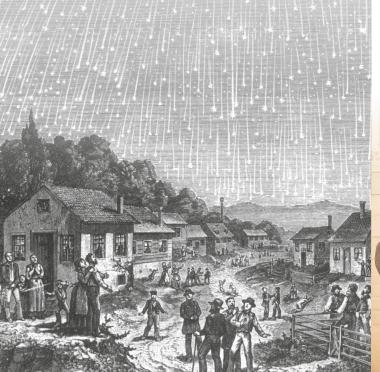
(Picture of Neptune - NASA)

# LEONIDS AND COMET TEMPLE -TUTTLE

In 1866 a meteor shower named Leonids, occurred at a magnificent rate of at least 1000 shooting stars per hour.

It was calculated that these outbursts happened around every 33 years, the previous outburst having been in 1833.

Couch Adams showed this increase in rate of meteors was due to the Earth running into more concentrated areas of dust laid down during earlier appearances of the comet, Temple-Tuttle. This comet passes around the Sun in an orbit far more elliptical than the planets. He was therefore able to demonstrate the link between comets and meteor showers.



# COUCH ADAMS AND THE PRIME MERIDIAN

A meridian is an imaginary arc on the earth's surface. The Prime Meridian is the line of longitude that runs from north to south, around the world. People often stand astride it when visiting Greenwich Observatory.

In 1884 the location of the Prime Meridian was being contested. The countries vying for the honour were: Great Britain, France, Germany and Russia. Couch Adams argued that Greenwich observatory had the most accurate equipment to measure the arc, following successful presentation of the facts in Washingston, U.S.A, Greenwich became the accepted position of the Prime Meridian resulting in the newly-named Greenwich Mean Time (GMT) that we all know today. At the time, this decision left the French upset having adopted their own position of Paris time minus nine minutes for the Prime Meridian. This was repelled in 1978 when the French adopted the scientifically named Universal Time (UT) which is Greenwich Mean Time under another, less contentious name.



### LAWRENCE HOUSE MUSEUM -PL15 8BA: The museum has a dedicated space to Couch Adams where you can find his original documents and workbooks, used on his hunt for Neptune.

There is also a bust of a young Couch Adams, alongside a painting of him in his later years and a relief that depicts his wife, Eliza Bruce.

LAUNCESTON CASTLE - PL15 7DR:

The castle, a dominating feature of the

skyline in Launceston, dates from the early

Norman times.

During 1835, the build of the Western

Road weakened the Castle leading to the collapse of the South East Tower. Couch Adams would have seen changes to this structure as it was rebuilt.







# WESTERN ROAD

CASTLE GAOL: Long before Bodmin Jail, Cornwall's most notorious were sent to The Castle Gaol, Launceston.

Although Couch was now living in Cambridge, he was known to make frequent visits home and would no doubt have seen the changes in the town as the original gaol was demolished in 1842.



HIGH STREET

CASTLESTREET

MARKET STREET

## **BROAD STREET**

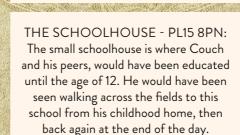
MADFORD LANE

Before the train line opened in 1865, significantly cutting travel time for Couch and his wife, he would make the two day journey to London, by catching a horse-drawn coach up to the capital.

SOUTH GATE

# THE COUCH ADAMS TOUR

LANEAST: This is the closest village to Couch Adams' childhood home of Lidcot Farm. Deep in the heart of Cornwall's countryside, with no light to brighten the skies, the solitary nature of this location enabled Couch Adams to view the night sky from here.





LANEAST **VILLAGE** 



This is the stream the children would play in during breaks at school.

