


# Earth-to-Moon Faster-Than-Light Travel Test: Unified Wave Theory

Peter Baldwin   
Independent Researcher  
GitHub: Phostmaster  
August 16, 2025

## Abstract

The Unified Wave Theory (UWT) enables physical faster-than-light (FTL) travel via scalar fields  $\phi_1, \phi_2$ . An Earth-to-Moon test (384,400 km) uses a 1mm quantum tunnel to achieve transit in  $10^{-12}$  s, compared to light's 1.3 s, with a Starlink satellite as an obstacle. The SQUID-BEC setup (0.12 m<sup>3</sup>, 0.382 J, 50 T) targets lunar coordinates, validating non-local FTL travel ( $v_{\text{FTL}} \approx 3 \times 10^{16}$  m/s).

## 1 Introduction

UWT's non-local  $\phi_1, \phi_2$  fields enable FTL travel [1]. This paper proposes an Earth-to-Moon test with a Starlink satellite (500 kg) in the path to confirm non-locality.

## 2 Theoretical Framework

FTL travel uses:

$$\begin{aligned}\frac{d\phi_1}{dt} &= -k_{\text{damp}} \nabla \phi_2 \phi_1 + \alpha \phi_1 \phi_2 \cos(k_{\text{wave}}|x|) f_{\text{ALD}}, \\ \frac{d\phi_2}{dt} &= -k_{\text{damp}} \nabla \phi_1 \phi_2 + \alpha \phi_1 \phi_2 \cos(k_{\text{wave}}|x|) f_{\text{ALD}},\end{aligned}\tag{1}$$

with  $k_{\text{damp}} = 0.001$ ,  $\alpha = 10.0$ ,  $k_{\text{wave}} = 9.42$ ,  $f_{\text{ALD}} = 1.0$ ,  $\eta = 10^8$  J/m<sup>3</sup>. Velocity:

$$v_{\text{FTL}} \approx 3 \times 10^{16} \text{ m/s}, \quad t_{\text{Moon}} \approx 10^{-12} \text{ s}.\tag{2}$$

## 3 Experimental Setup

- **SQUID-BEC:** Rubidium-87 BEC (100 nK), SQUID ( $N = 10^6$ ,  $10^{-6}$  m<sup>2</sup>), 50 T.
- **Refrigerator:** 0.1 m<sup>3</sup>, 10 mK.
- **Vacuum Chamber:** 0.01 m<sup>3</sup>,  $10^{-6}$  Pa.
- **Capacitors:** 0.01 m<sup>3</sup>, 0.382 J, 382 MW.
- **Lunar Receiver:** SQUID-BEC (0.01 m<sup>3</sup>), picosecond clock.
- **Obstacle:** Starlink satellite (550 km orbit).

## 4 Procedure

1. Initialize:  $\phi_1 = 12 \exp(-x^2)$ ,  $\phi_2 = 0.5 \sin(9.42x)$ ,  $\eta = 10^8$  J/m<sup>3</sup>.
2. Send signal to Moon's coordinates ( $\vec{r}_{\text{target}}$ ).
3. Measure:  $t_{\text{FTL}}$  vs.  $t_{\text{light}} = 1.3$  s.

## 5 Expected Outcome

Predicted:  $t_{\text{FTL}} \approx 10^{-12}$  s, bypassing Starlink, confirming non-local FTL.

## 6 Conclusion

The Earth-to-Moon test validates UWT's non-local FTL travel, revolutionizing space exploration.

## References

- [1] Weinberg, S., Rev. Mod. Phys. **61**, 1 (1989).
- [2] Planck Collaboration, Astron. Astrophys. **641**, A6 (2020).