

## Letter to John Washington, 5 November 1859

*Livingstone, David, 1813-1873*

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[0001]

(III)

River Zambesi, Shupanga,

5 Nov<sup>r</sup> 1859

Captain Washington R. N.

Sir

In answer to the  
letter of M<sup>r</sup> Laird of 4<sup>th</sup> January 1859  
a copy of which you enclosed I have  
to remark that the statements of that  
gentleman disagree in the most marked  
manner with the promises [he] held forth  
respecting the Steam Launch, and  
which I possess in his own  
hand writing, dated as follows,

" Hamilton Square

Birkenhead

Jany 16/58

"Dear Sir,

D<sup>r</sup> Livingstone's Launch  
will more probably exceed Ten knots  
than fall below it - when kept in  
proper trim - she appears admirably  
adapted for what she was proposed  
for, the upper Zambesi above " Tete"

[0002]

if she is heavily laden with stores  
her speed will of course be diminished  
as her draught of water is increased.  
As they are putting the engine together  
it is impossible to alter the power  
"even if desirable - which it is not."

(Here follows an irrelevant sentence  
about D<sup>r</sup> Baikies expedition

"D<sup>r</sup> Livingstone may calculate upon  
one Ton for every inch Disp<sup>t</sup> in  
the Launch, and as in the river he  
may safely load her to 2 feet from  
ten to twelve Tons will be available  
for stores and crew - as to space the  
plan sent up shews accurately the  
Room.

"On the Indian Rivers where light draught  
is so essential - all the River steamers

are used as Tugs which is the best  
application of the power and if my  
advice is taken this Launch will always  
"be kept light and any extra weight towed  
I remain faithfully yours  
Macgregor Laird  
a true copy  
David Livingstone  
the above note was sent to the Admiralty

[0003]

in answer to my protest against an engine  
of Ten horse power only.

The note which M<sup>r</sup> Laird has been good  
enough to print shews indisputably a  
disposition on my part to be satisfied. It  
was written while the Launch was still supplied  
with coal by the Pearl, and it was only  
when the coal was expended that I discovered  
the imposition that had been practised  
on the Expedition. It was somewhat  
mortifying, now that we were away from  
all the means of remedying the evil, to  
hear the statement made publicly. "Well  
these Liverpool people must have imposed  
on me", and to find that at the "trial by  
wood alone" "coal has seen to be  
thrown in once and again" and other  
things which though they can be proved  
I forbear mentioning

At the trial trip in the Mersey  
she drew 19 inches without anything  
in her [but the weight equal to the house drew 25 inches] and since she came out here  
and recieved her gear, she has never  
drawn less than Two Feet One Inch  
Her crew of twelve kroomen - no  
provisions - no fuel brought her  
down to two feet two inches

[0004]

While one days fuel (about a ton) and  
as near as we could ascertain nearly  
Four Tons brought her down to  
Two feet six inches. M<sup>r</sup> Laird  
"designed her to carry when loaded"  
to 2 feet Ten or Twelve Tons!"

I beg leave to submit the  
particulars of our last trip in M<sup>r</sup>  
Lairds "Dispatch boat" up the Shire.  
We had four barrels of salt meat  
and two bags of coffee, a medicine

chest, boxes of instruments of no  
great weight & half a bale of calico  
the whole would not be a Ton in  
weight. [Fuel say another Ton] We had forty four Makololo  
all men of light weight and six  
Englishmen. M<sup>r</sup> Laird "intended" her  
to draw 13 inches we found ourselves  
drawing about 30 - and with the  
steam between 50 & 60 lbs could not  
make three and a half knots.

We passed over ground therefore at the rate of less than one knot an hour & took  
nearly a month to go from Kongone Harbour to Chibisa's about 200 miles the  
women carrying loads on their heads  
walked on to the next bend of the river  
then waited till we came up again;  
(~~against the 2 1/2 knot current of the~~  
Shire) and to our disgust we saw a lame  
man walk away ahead of us altogether.

[0005]

But it will be said "She was overloaded  
Not at all we had taken the precaution  
of towing all the Makalolo except  
about a dozen to work the vessel  
in two whalers behind - and when  
doing so at a sudden bend the current  
rushing past caught her bow and  
one of the whalers when drawn across  
stream with her was swamped and  
to our sorrow one poor fellow  
was drowned.

Take another example of the per-  
formances of the Launch - In going  
down from Shupanga to the sea  
We were a good deal lighter than  
in the last trip having no cargo  
& not 1/2 a ton of ~~nails~~ [fuel] & with  
but 14 natives and four Englishmen.  
M<sup>r</sup> Medlycott of the Lynx took  
charge, and was dumfounded  
to find that a stiff breeze held her  
paddles to a dead lock [with between 50 & 60 lbs steam] and obliged  
us to anchor. that was nothing  
wonderful to us, for wherever  
we have a 3 1/2 knot current  
we cannot stem it even with 60lbs of steam

[0006]

If M<sup>r</sup> Laird will explain why at the  
trial trip she ran with the tide only in  
one direction then waited till the tide turned

and ran back with it in the other, the discrepancy of performances here and there may be accounted for. Her top speed in the Zambesi against the current \*

\* measured by anchoring in a part which we cannot stem while going at full speed

measured repeatedly by Patent and common log - has been 3 1/2 knots with between 50 & 60 lbs of steam. M<sup>r</sup> Laird promised over "Ten knots"

Funnel - Furnace - Deck - and Bottom all become shaky simultaneously, after only Twelve months work - i.e £1200 for 12 months. Extras all paid for besides. It ought to be known to the Admiralty that do what we would we never could keep our cabin dry. We have had carpenters from men of war attempting to remedy this evil, but have been obliged to sleep on damp rotten cushions continuously notwithstanding all our efforts. Our botanist cannot take his collections to the sea without

[0007]

eminent risk of their suffering the same fate as those of poor D<sup>r</sup> Vogel of the great Niger Expedition. He mentions in his journal that his cabin was always in the same state as ours, and public blame was most unjustly attached to the Admiralty. I enclose a report in view of the bottom of this most unworkmanlike & flimsy vessel.

Copy

Report

1<sup>st</sup> August 1859. At Kongone harbour

Beached the vessel furnished by M<sup>r</sup> Macgregor Laird to the Zambesi Expedition on the right bank of Kongone harbour and dug out the sand from the middle compartment in order to examine her bottom. Found the plates which were only one sixteenth of an inch at the beginning to be fairly worn & rusted through in several places, and the whole so very thin that it is quite impossible to patch them - bolts would have nothing to hold on by. The rent would be

made worse by any mending welding  
hammering - no other process such  
as wedging or staying can be applied  
We are therefore obliged to puddle the

[0008]

bottom with clay in canvas bags over the  
holes (covered with India rubber) as the only  
means in our power of keeping her  
afloat to perform the service of taking us  
out of the unhealthy Delta. The Funnel  
is also full of holes

(signed)

David Livingstone

John Kirk M.D.

Charles Livingstone

A true copy

David Livingstone

In conclusion as every point advanced  
respecting the engine - boiler & vessel for  
the information of the Admiralty has been  
the result of my own patient and minute  
investigation, I am sorry to observe the  
mean, ungenerous & totally unfounded  
insinuation against our "Clyde Engineer"  
who was not only recommended by Tod  
& Macgregor of Glasgow (a firm in  
every way superior to M<sup>r</sup> Laird's) ~~but~~ as  
the very best man in their employment,  
and we have been thoroughly satisfied with  
his skill, zeal, and trustworthiness, but  
he has joined us at a considerable pecuniary  
disadvantage to himself as he occupied a post  
of chief engineer in the largest sea going  
ships. We intend sending the engine &  
boiler to a Museum in Glasgow.

David Livingstone