Re: Questions on Laplace transform

Source: http://sci.tech−archive.net/Archive/sci.math/2008−05/msg02533.html

- *From*: Rskater <Rskater@xxxxxxxxxxx>
- *Date*: Sat, 17 May 2008 15:09:17 GMT

The World Wide Wade wrote:

> In article <lppXj.144599$Cj7.137009@pd7urf2no>,
> Rskater <Rskater@xxxxxxxxxxx> wrote:
>
> > Let us assume f(x) is a linear combination of an exponential function.
> > i.e. \[f(x) = \sum_{i=1}^n a_i \exp(−b_i x) \] with $b_i>0$ for all i,
> > but some of a_i's could be negative.
> >
> > Also assume F(s) is the Laplace Transform of f(x).
> >
> > Is the following true?
> > If F(s) has no positive roots then f(x) >0 for x>0.
> >
> > Thanks
>
> No, try f(x) = e^(−x) − 2e^(−2x).

Thank you for the counter example.

So, if I have F(s)> 0 for 0<s<1, would that work.

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