

Glossary

Name	Description	$f(x)$
T	Duration (months) of the study	
iKM(t)	Inverse Kaplan-Meier curve	
KM(t)	Kaplan-Meier curve	$t = \{t_0, t_1, t_2, \dots, T\}$ $KM(t) = 100 - iKM(t)$
Time Lost	Time course of the total units of time spent by the subjects after the event has occurred during the study follow-up normalized to 100 individuals	$\int_0^{\tau} iKM(t) dt$
Time Gain	Time course of the extra units of event-free time that are lived by 100 subjects in the active treatment arm (a) with respect to 100 in the control arm (c). Positive values indicate a protective effect of the active treatment whereas negative values represent a harmful effect.	$\int_0^{\tau} iKM_c(t) - iKM_a(t) dt$
t_{50%}	Time at which the population in follow-up falls below 50%.	
Time Gain f50%	Fitting of the Time Gain curve performed in the interval $[0; t_{50\%}]$. The fit is a polynomial second order function, forced to pass through the origin ($y = at^2 + bt$)	$Fit[0; t_{50\%}] \left\{ \int_0^{\tau} iKM_c(t) - iKM_a(t) dt \right\}$
MoT	Months of treatment: time course of the exposure to the treatment expressed in months and normalized to 100 subjects	$\int_0^{\tau} KMa(t) dt$
y⁺	Time Gain expressed in year	$\frac{\int_0^{\tau} iKM_c(t) - iKM_a(t) dt}{12}$
MoT/y⁺	Months of treatment necessary to gain 1 year of event-free life as measured by the Time Gain curve	$\frac{\int_0^{\tau} KMa(t) dt}{\frac{\int_0^{\tau} iKM_c(t) - iKM_a(t) dt}{12}}$
MoT/y⁺f50%	Months of treatment necessary to gain 1 year of event-free life as measured by the Time Gain f50% function	$\frac{\int_0^{\tau} KMa(t) dt}{(Fit[0; t_{50\%}] \left\{ \int_0^{\tau} iKM_c(t) - iKM_a(t) dt \right\}) / 12}$
t_{6m}	Time at which the <i>Time Gain Obs</i> = 6 months	
eMoT/y⁺	Estimated MoT/y ⁺ obtained through the fitting of the MoT/y ⁺ f50% curve performed in the interval $[t_{6m}; T]$. The fit is a power function ($y = at^b$)	$Fit[t_{6m}; T] \left\{ \frac{\int_0^{\tau} KMa(t) dt}{\frac{(Fit[0; t_{50\%}] \left\{ \int_0^{\tau} iKM_c(t) - iKM_a(t) dt \right\})}{12}} \right\}$
NNT	Number needed to treat: time course of the subjects on treatment normalized to 100 subjects	$\frac{\int_0^{\tau} KMa(t) dt}{t}$
NNT/y⁺	Number of patients who need to be treated to gain 1 year of event-free life as measured by the Time Gain curve	$\frac{\frac{\int_0^{\tau} KMa(t) dt}{t}}{\frac{\int_0^{\tau} iKM_c(t) - iKM_a(t) dt}{12}}$
NNT/y⁺f50%	Number of patients who need to be treated to gain 1 year of event-free life as estimated through the Time Gain f50% function	$\frac{\frac{\int_0^{\tau} KMa(t) dt}{t}}{\frac{(Fit[0; t_{50\%}] \left\{ \int_0^{\tau} iKM_c(t) - iKM_a(t) dt \right\})}{12}}$
eNNT/y⁺	Estimated NNT/y ⁺ obtained through the fitting of the NNT/y ⁺ f50% curve performed in the interval $[t_{6m}; T]$. The fit is a power function ($y = at^b$)	$Fit[t_{6m}; T] \left\{ \frac{\frac{\int_0^{\tau} KMa(t) dt}{t}}{\frac{(Fit[0; t_{50\%}] \left\{ \int_0^{\tau} iKM_c(t) - iKM_a(t) dt \right\})}{12}} \right\}$