Of course, if $\{D_\lambda\}$ is the linear system

$$D_\lambda = (\lambda_0\sigma_0 + \cdots + \lambda_n\sigma_n)$$

associated to the vector space $\{\sigma_0, \cdots \sigma_n\}$ of sections of the line bundle L above, then the map f given by the system $\{D_\lambda\}$ and the meromorphic functions σ_i/σ_0 are the same.

Note that while any linear system gives in this way a rational map, we have an exact correspondence

$$\left\{\begin{array}{l}\text{linear systems of divisors} \\ \text{on } M \text{ with base locus of} \\ \text{codimension} \geq 2\end{array}\right\} \longleftrightarrow \left\{\begin{array}{l}\text{rational maps} \\ f: M \longrightarrow \mathbb{P}^n, \text{ up to} \\ \text{automorphisms of } \mathbb{P}^n\end{array}\right\}.$$

pf Given a rational map $f: M \longrightarrow \mathbb{P}^n$,

$f: z \longmapsto [1, f_1(z), \cdots f_n(z)]$, f_i's meromorphic functions.

By P491, f is given by a holomorphic map

$f: M - V \longrightarrow \mathbb{P}^n$, V subvariety of cod. ≥ 2

Consider the divisors $(X_0 = 0), \cdots (X_n = 0)$ in $\mathbb{P}^n$.

$\Rightarrow$ $f(M-V) \not\subset (X_i = 0)$ for all i. if not, then

$f_i(M-V) = 0 \Rightarrow f_i(M) = 0 \Rightarrow$ Contradiction (to the nondegeneracy)

$\Rightarrow \{f^*(X_i = 0)\}$ is a set of divisors in $M-V$.

$\Rightarrow$ By P134 & P136 $f^*[H_i] = [f^*H_i] = f^*[H_0] = [f^*H_0]$ and

if we let $(\eta_i = 0) = f^*H_i$, then

$\exists$ a meromorphic function g_i on $M-V$ s.t

$\eta_i = g_i\,\eta_0$, where $H_i = (X_i = 0)$.