mutual-primitive-recursion[11,40]

$\forall A, B$:Type, f_0:A, g_0:B, F:($\mathbb{N} \to A \to B \to A$), G:($\mathbb{N} \to A \to B \to B$).
$\exists f$:$\mathbb{N} \to A$
$\quad \exists g$:$\mathbb{N} \to B$
$\quad\quad (f(0) = f_0$
$\quad\quad$ & $g(0) = g_0$
$\quad\quad$ & $(\forall s$:$\mathbb{N}^+$. $f(s) = F(s$ - $1, f(s$ - $1), g(s$ - $1))$ & $g(s) = G(s$ - $1, f(s$ - $1), g(s$ - $1))))$