Long-distance interaction between caller and callee

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$t ::=$		term
	v	value
	x	variable
	$t\ t$	application
$v ::=$		value
	c	constant
	$\lambda x : \tau\ .\ t$	abstraction
$\tau ::=$		type
	κ	type of constants
	$\sigma \to \sigma$	arrow type
$\sigma ::=$		type with effects
	$E\ !\ \tau$	effect annotation
$E ::=$		effect set
	$\varnothing_\epsilon$	empty effect
	E, ϵ	effect extension
$\Gamma ::=$		context
	$\varnothing_\Gamma$	empty context
	$\Gamma,\ x : \tau$	variable binding

Figure 1: Syntax

$$\boxed{\Gamma \vdash t : \sigma}$$

$$\frac{}{\Gamma \vdash c : \varnothing_\epsilon \mathbin{!} \kappa} \text{ (T-Constant)}$$

$$\frac{x : \sigma \in \Gamma}{\Gamma \vdash x : \sigma} \text{ (T-Variable)}$$

$$\frac{\Gamma,\ x : \tau \vdash t : \sigma}{\Gamma \vdash \lambda x : \tau\ .\ t : \tau \to \sigma} \text{ (T-Abstraction)}$$

$$\frac{\Gamma \vdash t_1 : E_1 \mathbin{!} \tau_1 \qquad \Gamma \vdash t_2 : E_2 \mathbin{!} (\tau_1 \to E_3 \mathbin{!} \tau_2)}{\Gamma \vdash t_2\ t_1 : E_1, E_2, E_3 \mathbin{!} \tau_2} \text{ (T-Application)}$$

Figure 2: Typing rules