Developmental schedule of Fears


Authors note that different domains of fear come ‘online’ during human development. One can delineate a general developmental schedule for typical childhood fears, starting with specific situations in infancy, moving on to specific targets like monsters and animals in early childhood, while fears of accidents, injury or contagion appear slightly later (middle to late childhood), and social threats appear in late childhood and become salient in early adolescence. This schedule is astonishingly stable between children in vastly different kinds of social and cultural environments, ranging from nomadic foraging tribes to large cities. The developmental schedule is not only stable, but also seems evolutionarily appropriate.

Infants
As infants cannot initiate movement or precautionary action, their only defense is active protection from caregivers, which suggests that the most dangerous situation is simply the physical absence of caregivers, or the presence of adults other than caregivers. Stranger anxiety develops early in infants (around 8 months) and persists until the toddler years.

18 months to 5 Years
The beginnings of early childhood coincide with the emergence of active exploration of the environment and potential encounters with dangers that children have neither the physical strength nor the cognitive equipment to deal with. Early exploration still includes typical fears of infancy, notably stranger anxiety that is modeled from the mother.

Early and Middle Childhood
The typical fears of early and middle childhood target monsters and other kinds of mysterious intruders. Most children spontaneously provide minimal descriptions of these entities, often enriched with material from folktales or cartoons. In particular, most children described the putative monsters as aggressive, ready to pounce, lurking in the dark, equipped with teeth or claws, and other such features of dangerous animals. At that age they also acquire fears of quasi-predators from vicarious experience and information.

Early childhood is also the period at which young children develop an understanding of illness, pathogens and contagion. At this stage, most children have a rudimentary, intuitive understanding of physiological function. They see most illness as the result, not of dysfunction, but of invasion by invisible vectors, even before they learn about local theories of germs or pathogens.

Middle and Late Childhood
These early fear-targets are generally present throughout middle and into late childhood. In addition, this is also a period during which social fears come online.  

**Adolescence**

Intense social threats are added to the mix. The main change here is not that the fear-targets are different but that their intensity and behavioral effects are much greater. A salient fear-target is loss of friendship, e.g. friends “betraying” one, allying with “enemies”, or being less (or less exclusively) committed to one. In adolescence, friendship is more closely associated with social support than in childhood.

**Key Points**

Humans could acquire fears through modeling, that is, vicarious experience – being in the presence of others who experience the fear and thereby modeling it – as well as conceptual information, e.g. from other people’s statements about the fear-target.

There is an evolutionary perspective to fear development: predation, contagion and contamination,., Status threat, attacks from other humans.

All threats relate to the fitness of the human, i.e. the ability to survive.

In some cases, the fears seem to focus on situations or objects that may be constitute insignificant or non-existent danger in modern circumstances. These would have been actual threats in the environments in which our fear-systems evolved. The most familiar example would be the great reluctance of young children to go to sleep on their own, away from protecting caregivers. Fears around bedtime, together with elaborate routines and rituals to assuage that anxiety, are almost universal in modern industrial societies with solitary sleeping arrangements and virtually unknown in the rest of the world.

To say that the developmental schedule is stable and appropriate does not imply that people can only acquire fears of ancestral objects (predators, contagions). Threat-detection is a collection of learning systems, which must precisely adapt to the ecologically and culturally diverse forms that fitness-threats can take. That is why an evolved fear-response to weapons is triggered by modern object like guns.

Fitness-threats can lead to pathology through stress, best understood in terms of allostatic load (negative consequences of the physiological changes induced by stressors).

Responses to stressors activate in various proportion both the sympathetic adrenal-medullar (SAM) system, involved in fast reactions to direct threat (freeze/flee/attack) and the hypothalamic–pituitary–adrenal (HPA) axis, involved in more long-term adaptation to change. Now the HPA system produces various hormones and neurotransmitters, including glucosteroids (cortisol in humans) with long-term pathogenic effects. Even though the system is generally hypo-reactive until adolescence, the same connection as in adults, between intensity or frequency
of stressors and poor health outcomes, is observed at elementary school-age especially in situation of insecure attachment.

References


