



**FIGURE 1.22** Three key factors (flooding, disturbance, and nutrients) control much of the variation in wetland communities. Hence, there is a chapter in this book for each of these key factors. If any one of these three factors is changed, the wetland will change in response.

creatures in that wetland. Take the Everglades as a well-known example. We shall look into the ecology of the Everglades in more detail later in the book. In terms of key factors, the Everglades are the result of extremely low nutrient levels, and seasonally varying water levels. Hence, the plants and animals that occur there must be able to tolerate these two key factors. And you can predict, with confidence, that if you increase nutrient levels, or change water levels, you will harm the species in that wetland. The key factor approach is therefore a very important way of thinking about wetlands. There are three principles that can guide our thinking about key factors.

### 1.7.1 Three principles

The first of the three principles, important in the study of key environmental factors that control wetland type and community composition, states that *a particular community or ecosystem is produced by multiple environmental factors acting simultaneously*. We can therefore picture any particular wetland (and that includes its species, communities, and services) as being a product of the pushing and pulling of opposing environmental factors (Figure 1.22). Any specific wetland you encounter has arisen as a temporary consequence of