# H2-3 Table of control methods

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| CauseControl | Cultural | Resistant varieties | Biological | Chemical |
| Fungi and water moulds | Crop rotation can be beneficial in many casesFor WM and in the case of root infection irrigate sparingly avoid waterlogged soils if possible. | Yes they do exist but can be difficult to obtain and are not available for many crop/disease combinations | Some preparations do exist but not widely available. | Yes: there are many fungicides that can be used to protect plants and control fungi. |
| Bacteria | Crop rotation can be beneficial in many casesGood phytosanitation is important here | Yes as above. | Not possible | Only copper based products are suitable and these are protectant only |
| Virus | Cultural control of the vector is possible (if there is one). Removal of weed reservoir helps.Avoid touching plants in the case of mechanical transmitted viruses | Yes as above | Some experimental work which involves protecting plants by inoculation with a benign virus | The only means of chemical control is to control the vector if there is one. |
| Phytoplasma | Cultural control of the vector is possible. Removal of weed reservoir. | Some resistance of limited use. Mostly researched in perennial crops. | Control of the vector and reduction of weed reservoir | As above |
| Insects | Push pull cropping e.g. for Maize stalk borerDesmodium intercropped with maize surrounded by Napier grass.Light traps work for some pests hand picking suitable for larger ones over small areas | Only GM crops have good resistance to insects | Many examples but not widely available in many countries | Yes: there are many kinds of insecticides that will control insects |
| Mammals birds | Fences and traps can help. Bird scaring techniques may work. | Resistant varieties of sorghum do exist and awned cereals can help. | Predators can be encouraged which may help | Poisons for rats are commonplace. Gassing with exhaust fumes in underground burrows. |
| Weeds | Crop rotation and prevention of seeding by hoeing. Prevent them from setting seed and avoid spreading seed where possible. | Na | Some use of insects for control but not suitable for an agricultural environment | Chemical control available but special knowledge of use required |
| Nematodes | Crop rotation is essential to avoid nematode damage. | Resistant varieties do exist for some crops. | No: still in experimental stages | Very expensive and not applicable in most cases |
| Parasitic plant | Intercropping with suicide germination crops such as Desmodium. Prevent them from setting seed. and avoid spreading seed where possible | IITA has developed Striga resistant maize. | Not possible | Yes seed dressings are available to reduce Striga Strigaway |