Annexure III Pests and diseases of Crops

District	t: Kinnaur								
1	2	3	4	5	6	7	8	9	10
Host	Insect/ animal	Scientific name	Local name	Habitat	Time/ season of attack	Management mechanism	Associate d TK	Other detail s	Community knowledge holder
Whea t	Armyworm	Pseudaletia separata	Sena keet	Damage leaves and ear heads at grain development stage	Occasional / near harvesting stage	• Damage is near harvest, so only mechanical control			
	White grub	Melolomtha sp.	Safed gidar	Feed on roots	occasional				
Barle y	Armyworm	Pseudaletia separata	Sena keet	Damage leaves and ear heads at grain development stage	Occasional / near harvesting stage	• Damage is near harvest, so only mechanical control	-	-	-
Buck wheat	Greasy cutworm	Agrotis sp.	Katua Keet/ Toka	Found during day time hiding in soil close to stems	April-June & Oct-Nov	 Forking the soil exposes the larvae to avian predators Apply chlorpyriphos 20 EC @ 2 liters/ ha after mixing with 20-25 kg of sand 			
	Leaf eating weevil	Strophosomoides kumaoensis		Leaf feeder	-	-	-	-	-
Rajm ash	Blister beetle	<i>Mylabris</i> spp.	Ghodi	Adults feed voraciously on flowers	Regular/ at flowering and pod bearing stage	 Collect and destroy beetle Spray 625 ml methyl parathion 50 EC in 625 L water/ha. 	Collect and destroy beetles		Local people
	White grub	Melolomtha spp.	Safed gidar	Feed on roots	occasional	-	-	-	-
	Leaf eating weevil	Strophosomoides kumaoensis		Leaf feeder	-	-	-	-	-
	Cabbage semilooper	Plusia orichalcea	Kubad keet	Leaf feeder	occasional	-	-	-	-
	Weevil	Hypurus spp.							

White grubsBrahmina coriacea Holotrichia longipemis Anomala dimidiata Melolontha spp.Safed Gidar• Soil dwelling grubs are present in soil at a depth of 5-20 cm • Grubs make large, shallow, and circular holes in tubersJune-Oct expose grubs, pupa adults to birdsMelolontha spp.Amorala dimidiata Melolontha spp.• Grubs make large, shallow, and circular holes in tubers• Ploughing to expose grubs, pupa adults to birdsMelontha spp.• Crubs make large, shallow, and circular holes in tubers• Display the soil expose grubs, pupa adults to birdsAmara nthusGreasy cutworm nthusAgrotis sp.Katua Kcet/ TokaFound during day time hiding in soil close to stemsApril-June & Oct-Nov & Oct-Nov <b< th=""><th>Potat o</th><th>Greasy cutworm</th><th>Agrotis ipsilon</th><th>Katua Keet/ Toka</th><th>Found during day time hiding in soil close to stems •Newly hatched larvae first feed on haulms and then drop from plants and feed underground on stems and tubers</th><th>April-June & Oct-Nov</th><th> Forking the soil exposes the larvae to avian predators Apply chlorpyriphos 20 EC @ 2 liters/ ha after mixing with 20-25 kg of sand </th><th></th><th></th></b<>	Potat o	Greasy cutworm	Agrotis ipsilon	Katua Keet/ Toka	Found during day time hiding in soil close to stems •Newly hatched larvae first feed on haulms and then drop from plants and feed underground on stems and tubers	April-June & Oct-Nov	 Forking the soil exposes the larvae to avian predators Apply chlorpyriphos 20 EC @ 2 liters/ ha after mixing with 20-25 kg of sand 		
nthus Toka time hiding in soil close to stems & Oct-Nov exposes the larvae to avian predators • Apply chlorpyriphos 20 EC @ 2 liters/ ha after mixing with 20-25 kg of sand =		White grubs	Holotrichia longipennis Anomala dimidiata	Safed Gidar	 Soil dwelling grubs are present in soil at a depth of 5-20 cm Grubs make large, shallow, and circular 	June-Oct	 expose grubs, pupa and newly formed adults to birds Beetle collection at night and killing in water mixed with kerosene Chlorpyriphos 20 EC @ 2 litres/ ha after mixing with 20-25 kg of sand Insecticide application should occur soon after adult emergence, and should coincide with egg laying or egg 		
Leaf eating Strophosomoides Leaf feeder					time hiding in soil close to stems	.	 exposes the larvae to avian predators Apply chlorpyriphos 20 EC @ 2 liters/ ha after mixing with 		
weevil kumaoensis		Leaf eating	-		Leaf feeder	-		-	-

Musta rd	Cabbage aphid	Brevicoryne brassicae	Tela	Sap suckers		 Spray methyl demeton 25EC or dimethoate 30EC @1ml/l. If crop is meant for 'Sag' purpose, then spray malathion 50EC @ 1ml/l and observe 1 week waiting period 			
	Green peach aphid	Myzus persicae	Tela	Sap suckers					
	Cabbage butterfly	Pieris brasscae	-	Leaf feeder					
	Painted bug	Bagrada hilaris	-	Sap suckers					
Kalaz eera	White grub	Melolomtha spp.	Safed gidar	Feed on roots	occasional	-	-	-	-
	Weevil	Hypurus spp.							
	Cabbage semilooper	Plusia orichalcea	Kubad keet	Leaf feeder	occasional	-	-	-	-
	Gram pod borer	Helicoverpa armigera	Falli ki sundi	The larvae feed on leaves and umbels	March	• Apply HaNPV @ 250LE/ ha	-	-	-
	Butterfly	Papilio spp.		Leaf feeder					