PARATHION-METHYL (059)

APPRAISAL

The CCPR at its 33rd Session (Paragraph 59, ALINORM 03/24, 2002) requested the JMPR to consider an MRL for nectarines based on extrapolation from peaches, at the request of the Delegation of Australia.

Parathion-methyl is registered in Italy for use on stone fruits. The JMPR (2000) estimated a maximum residue level of 0.3 mg/kg and STMR and HR values of 0.095 and 0.22 mg/kg for parathion-methyl on peaches. The estimates were based on supervised trials in Italy.

The Meeting agreed to extrapolate the proposed MRL of 0.3 mg/kg to nectarines.

RECOMMENDATIONS

On the basis of the data from supervised trials, the Meeting concluded that the residue levels listed in Table 1 are suitable for establishing maximum residue limits and for intake assessment.

Definition of the residue for compliance with MRLs: *parathion-methyl*. For estimation of dietary intake: *sum of parathion-methyl and paraoxon-methyl, expressed as parathion-methyl*.

Table 1. Summary of recommendations.

Commodity		MRL, mg/kg	STMR mg/kg	HR mg/kg
CCN	Name			
FS 0245	Nectarines	0.3	0.095	0.22

DIETARY RISK ASSESSMENT

Long-term intake

Nectarines are included with peaches in the five regional diets, so the long-term intake needed no further assessment.

Short-term intake

The International Estimated Short Term Intake (IESTI) for parathion-methyl was calculated for nectarines. The results are shown in Tables 2 and 3.

The IESTI for the general population and for children represented 9% and 20% of the parathion-methyl acute RfD, respectively. The Meeting concluded that the short-term intake of residues of parathion-methyl, resulting from its uses on nectarines that have been considered by the JMPR, is unlikely to present a public health concern.

Table 2. International Estimated Short-term Intake (IESTI) of parathion-methyl by the general population (acute RfD = 0.030 mg/kg bw/day or 30 µg/kg bw/day).

Codex Code	Commodity	STMR or STMR-P mg/kg	HR or HR-P mg/kg	Large portion diet				Unit weight				Variability factor	Case	IESTI µg/kg bw/day	% acute RfD rounded
				Country	Body wt (kg)	Large portion g/kg bw/day	Large portion, g/person	Unit wt, g	Country	% edible portion	Unit wt, edible portion, g				
FS 0245	Nectarines	0.095	0.22	USA	65.0	9.08	590	110	FRA	90	99	3	2a	2.67	9

Table 3. International Estimated Short-term Intake (IESTI) of parathion-methyl by children up to 6 years (acute RfD = 0.030 mg/kg bw/day or 30 µg/kg bw/day).

Codex Code	Commodity	STMR or STMR-P mg/kg	HR or HR-P mg/kg	Large portion diet				Unit weight				Variability factor	Case	IESTI µg/kg bw/day	% acute RfD rounded
				Country	Body wt (kg)	Large portion g/kg bw/day	Large portion, g/person	Unit wt, g	Country	% edible portion	Unit wt, edible portion, g				
FS 0245	Nectarines	0.095	0.22	AUS	19.0	15.90	302	110	FRA	90	99	3	2a	5.79	20