ZAKONODAJA IN TEHNIČNE REŠITVE ZA ZMANJŠEVANJE POJAVOV ZANAŠANJA (DRIFTA) PRI NANOSU PRIPRAVKOV V SADOVNJAKIH IN VINOGRADIH

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IZVLEČEK

V številnih severnoevropskih državah so uvedli zakonodajne ukrepe da bi preprečili negativne učinke zanašanja pripravkov za varstvo rastlin na okolje. Razvili so sistem varovalnih pasov s katerim so omogočili nadaljevanje uporabe nekaterih za okolje manj prijaznih pripravkov. Širina varovalnih pasov je prilagojena vrsti opreme za nanos pripravkov, odmerku in lastnostim posameznega pripravka ter lastnostim biotopov v neposredni bližini s pripravki tretiranih zemljišč (vodni viri, naselja, občutljivi biotopi, ...). Razvili so tudi klasifikacijo opreme za nanašanje glede na stopnjo tveganja za pojave zanašanja pripravkov izven območja nanosa. V mediteranskih deželah so do sedaj v zvezi s to tematiko opravili malo raziskav. Naraščajoča skrb glede varovanja okolja in potreba po usklajevanju zakonodaje znotraj Evropske unije je privedla do razvoja skupnih usmeritev na tem področju. Z namenom ovrednotenja problema zanašanja pripravkov v italijanskih vinogradih in sadovnjakih so izvedli študijo, ki je potekala skladno s standardom (ISO DIS 22866). Rezultati raziskave kažejo, da ima na obseg zanašanja pripravkov v okolico sadovnjakov in vinogradov zelo velik vpliv gojitvena oblika – struktura krošnje dreves in oblika listne stene vinograda. Pri vinogradih z ožjimi medvrstnimi razdaljami in gostejšo listno steno so bile izmerjene vrednosti količine v okolico zanesenih pripravkov manjše, kot v vinogradih z večjimi medvrstnimi razdaljami in ožjimi listnimi stenami. Velike vrednosti depozitov pripravkov zanesenih izven območja tretiranja so bile izmerjene v nasadih, kjer so škropljenja opravljali s pršilniki z veliko kapaciteto za izmenjavo zraka in kjer so uporabljali šobe, ki oblikujejo drobne kapljice. Z uporabo antidriftnih šob so dosegli značilno zmanjšanje zanašanja.

Ključne besede: zanašanje pripravkov, vinogradi, sadovnjaki, antidriftne šobe, pršilniki

ABSTRACT

LEGISLATIVE MEASURES AND TECHNICAL SOLUTION ABLE TO REDUCE SPRAY DRIFT IN ARBOREAL CROP

In several Northern European countries legislative measures have been introduced to prevent the negative effects of spray drift on the environment. The use of buffer zones has been introduced to enable the continued use of some environmentally sensitive pesticides. The width of these is dependant the type of equipment used, the applied pesticide dosage and the features of the area adjacent to the treated field (i.e. presence of surface water, urban sites, etc.) (Gilbert, 2000). Also, a classification of spraying equipment, according to drift risk, has been defined (Herbst and Ganzelmeier, 2000; Walklate *et al.*, 2000). In Mediterranean countries, relatively little research has been carried out on this subject. Nevertheless, the rising concerns about environmental safety and the need to harmonise legislative measures for the mitigation of drift risks is a European Union directive. With the purpose of quantifying the problem of spray drift in Italian vineyards and orchards, a specific study has been carried out following the International guidelines (ISO DIS 22866). The results indicate a considerable influence of the canopy characteristics on the amount of drift deposit assessed on the ground in the area adjacent to the vineyard orchard sprayed. The vineyard featured by a narrower spacing and compact vegetation gave lower drift than the vineyard featured by wider spacing and thinner canopy. Higher values of drift were always observed when fine droplets and high air flow rates were used, while adopting air inclusion nozzles gave considerable drift reductions.
Key words: application drift, vineyards, orchards, drift reducing nozzles, spray

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