



SDI Review Form 1.6

Journal Name:	British Journal of Mathematics & Computer Science
Manuscript Number:	2014_BJMCS_15975
Title of the Manuscript:	A MATHEMATICAL MODEL FOR POPULATION DENSITY DYNAMICS OF WEED-CROP COMPETITION
Type of the Article	Research paper

General guideline for Peer Review process:

This journal's peer review policy states that **NO** manuscript should be rejected only on the basis of '**lack of Novelty**', provided the manuscript is scientifically robust and technically sound.

To know the complete guideline for Peer Review process, reviewers are requested to visit this link:

(<http://www.sciencedomain.org/page.php?id=sdi-general-editorial-policy#Peer-Review-Guideline>)



SDI Review Form 1.6

PART 1: Review Comments

	Reviewer's comment	Author's comment (if agreed with reviewer, correct the manuscript and highlight that part in the manuscript. It is mandatory that authors should write his/her feedback here)
Compulsory REVISION comments	The main problem of this manuscript are the substitutions on lines 106 and 107. Since the difference equations are coupled, you can not substitute one into (2.2) and the other into (2.3). This (error) implies many other errors: In line 110 $\alpha_{12} = \alpha_{21} = 1$, and furthermore (2.6)-(2.8) are changed, and (2.9)-(2.11) must be changed. Section 2.2.2 : (2.14) exists only if $\varphi = \theta$ and $\alpha_1 \neq \alpha_2$, etc. Also (2.19) and (2.20) is not OK... Also in Fig. 2.1 $\alpha_{12} = \alpha_{21} = 1$, etc.	Line 106 now in Line 81: The same expressions to change the variables are substituted into (2.2) and (2.3), this authenticate the subsequent equations and analysis. Line 110 now Line 84: $\alpha_{12} \neq \alpha_{21} \neq 1$ Since $a_{12} \neq a_{22}$, and $a_{21} \neq a_{11}$ are inter and intra species competitions, which measure different effects. So (2.6)-(2.8) and (2.9)-(2.11) are OK. (2.14) exists only if $\alpha_{12} \neq \alpha_{21}$ and $\theta = \phi$, corrections effected, also in Table 2.1 (2.19) and (2.20) are OK
Minor REVISION comments	like in line 98 begin with small $n_{1,t+1}$ and introduce in line 106 (107) $n_{1,t+1} = (1/a_1) N_{1,t+1}$, etc. For all mathematical symbols use Equation letters. E.g. use $\mathbf{t}$ and not t. Also use the same size of fonts and indices. In line 322 change a_3, a_1 and a_2 with e.g. f_3, f_1 and f_2 (or something similar), since you already defined a_1 and a_2. In line 332 change $(-1)^n$ with $(-1)^3$ (do the same in Table 3.1). Could you use different width (and/or style) of lines (besides colors) in Figure 3.1? Did you chose the parameters listed in line 365? Are they converging to (1.00,0.27,0.80)? In line 372 change one (1) with 1. In line 378 change Mathematical	Corrections effected thus; $N_{1,t+1} = a_{11} n_{1,t+1}$, $N_{2,t+1} = a_{22} n_{2,t+1}$ (please, see Lines 73, 77, 81 and 84) For symbols, see corrections in Line 120, 121 and 122. In line 322: a_1, a_2 and a_3 are coefficients which represent constant values, not function. Line 332 and Table 3.1 corrected Line 365: Yes, the parameter values were chosen to satisfy the analytical conditions, they converging to (1.00,0.27,0.80). In lines 372 and 378, ; corrections effected



SDI Review Form 1.6

	with Mathematica.	
<u>Optional/General</u> comments	Like suggested in <u>Compulsory</u> REVISION comments try to rewrite the paper (up to conclusions) and take care to Figures like 3.1 (you can add some more numerical examples). The topic is interesting .	The correction of change of variables made in line 106 now in line 81 authenticated all the subsequent equations and analysis carried out in the paper