

ENDOFIT ACHITQILAR OLIISHDA OZUQA MUHITLARI VA ULARNING SAMARADORLIGI.

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Annatotsiya: Ushbu maqolada endofit mikroorganizmlar olishda foydalaniladigan strelizatsiya usullari , jumladan spirt, demostas haqida gap boradi. Ammo endofit achitqilar olish judayam murakkab jarayon bo`lib, bunda bir qancha ozuqa muhitlari: sabura, Kartoshkali agar, susla kabilardan foydalandik. Bunda ularni tajriba uchun ikki xil: ya`ni qattiq va suyuq ozuqa muhitda o`stirib ko`rdik. Natijada, turlicha holatda endofit achitqilar olish bo`yicha tafsilotlarga ega bo`ldik.

Kalit so`zlar: Endofit achitqilar, ozuqa muhit, sabura, kartoshkali agar, susla.

Abstract: This article talks about sterilization methods used to obtain endophytic microorganisms, including alcohol, demostasis. However, obtaining endophytic yeasts is a very complicated process, and we used a number of nutrient media: sabura, potato agar, soy sauce, etc. In this case, we grew them in two types of experiment: i.e. solid and liquid nutrient media. As a result, we got details on obtaining endophytic yeasts in different conditions.

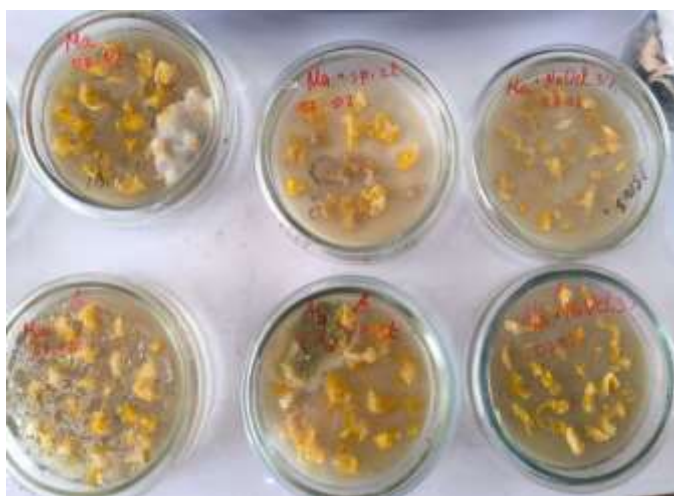
Key words: Endophytic yeasts, nutrient medium, sabura, potato agar, susla.

Kirish. Endofit mikroorganizmlarni o`rganish va ularni ajratish olish yuzasidan ko`plab olimlar ilmiy tadqiqotlar olib borishgan. Jumladan Z. Abbas, S. Saggu, M. Sakeran, N. Zidan, H. Rehman, S. Arora, P. Patel, M. Vanza, T. Cook, K. Brown, J. Boyle, G. Strobel, D. Tousch, A. Lajoix, E. Hosity, J. Azay-Milhau, K. Ferrare, D. Jahannault, H. Yu, L. Zhang, L. Li, C. Zheng, L. Guo, kabi olimlar o`z ilmiy ishalrida turli dorivor, qishloq xo`jaligi uchun ahamiyatga ega bo`lgan o`simliklarning endofitlar tarkibini, ularning antimikrob, antifungal va antogonistik xususiyatlarini, ikkilamchi metabolitlar, biologik aktiv moddalar ajratishi, o`simlik bilan o`zaro munosabatlari va uning biotexnologiyadagi istiqbolli jihatlarini o`rganishgan. Jumladan, Cichorium intybusning endofitlar tahlili, fitokimyosi bo`yicha bo`yicha Janubiy Afrikadagi Johannesburg universitetining doktori D.T. Ndinteh, V. B. Mavumengwana va ularning shogirdlari katta muvaffaqiyatli ilmiy ishlar olib borishgan. Bundan tashqari, A.Amirita, P. Swetha, N.S. Vasanthi, K.P. Kannan kabi olimlar endofitlar haqida ko`plab ilmiy izlanishlar ma`lum. Ushbu izlanishlar sanoat miqyosida endofitlar biotexnologiyasi sohasida katta yutuqlarga erishishi, istiqbolli

loyihalarga ega bo'lishi va yer yuzidagi ekologik, oziq-ovqat xavfsizligi, qishloq xo'jaligi kabi tarmoqlarda kuzatiladigan muommalarga samarali yechim topishi bilan ahamiyatli hisoblanadi.

Material va metodlar. Bunda dastlab strell skapel bilan o'simlik qismlari maydalandi, ular spirtida, demostatda 2 daqiqa qoldirildi, demostatda 3 daqiqa qoldirildi. Ular strell distillangan suv bilan yuvilib, ozuqa muhitlariga olindi. Ozuqa muhit sifatida dastlab agarli susladan foydalandi. Keyin esa kartoshkali agar, saburadan foydalandik. Bunda 50/50 suv va susla, 1 litrga 20 gr agar. Sabura esa 1 litrga 72 gr miqdorda foydalanildi.

Natijalar. Agarli suslaga ekilgan 18 ta petrining har biridan tekishlicha natijalar olindi. Bunda hosil bo'lgan koloniyalar, o'simlik qismlari soni sanab tahlil qilindi.



1-rasm. Mandarin va olmaning agarli suslada hosil qilgan koloniyalari: bunda oddiy, spirt bilan, NaOCl 3% bilan strelizatsiya qilingan uch xil variantlari aks etgan. Bundan tashqari har bir petrining antibiotikli va antibiotiksiz holatda qanday natijalar bo'lishini kuzatdik.

1-jadval. Endofit mikroorganizmlar ajratib olish uchun foydalanilgan ozuqa muhitlar

No	Chapek ozuq muhiti tarkibi	Miqdori	PDA	Miqdori
1	MgSO ₄ 7H ₂ O	0,5 gr	Kartoshka solodi	200,00 gr
2	KCL	0,5 gr	Glyukoza	20,00 gr
3	NANO ₃	0,2 gr	Agar	15,00 gr
4	K ₂ HPO ₄	1,0 gr	-	-
5	FeSO ₄	0,01 gr	-	-
6	Saxaroza	30,0 gr	-	-
7	Agar	15,0 gr	-	-
8	Distillangan suv	1 litr	-	-

Xulosa. Xulosa qilib aytganda endofit mikroorganizmlarni olma, kivi, lavlagi, mandarin kabi o'simliklarning turli qismlaridan olishga harakat qildik. Sabura, PDA, PDB, susla, agarli susla kabilardan foydalandik. Olingan natijalar mikroskopiya qilindi va kerakli foydalanish istiqbollari keying maqsad sifatida belgilab olindi.

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