DECART

Designing higher Education Curricula for Agility, Resilience & Transformation

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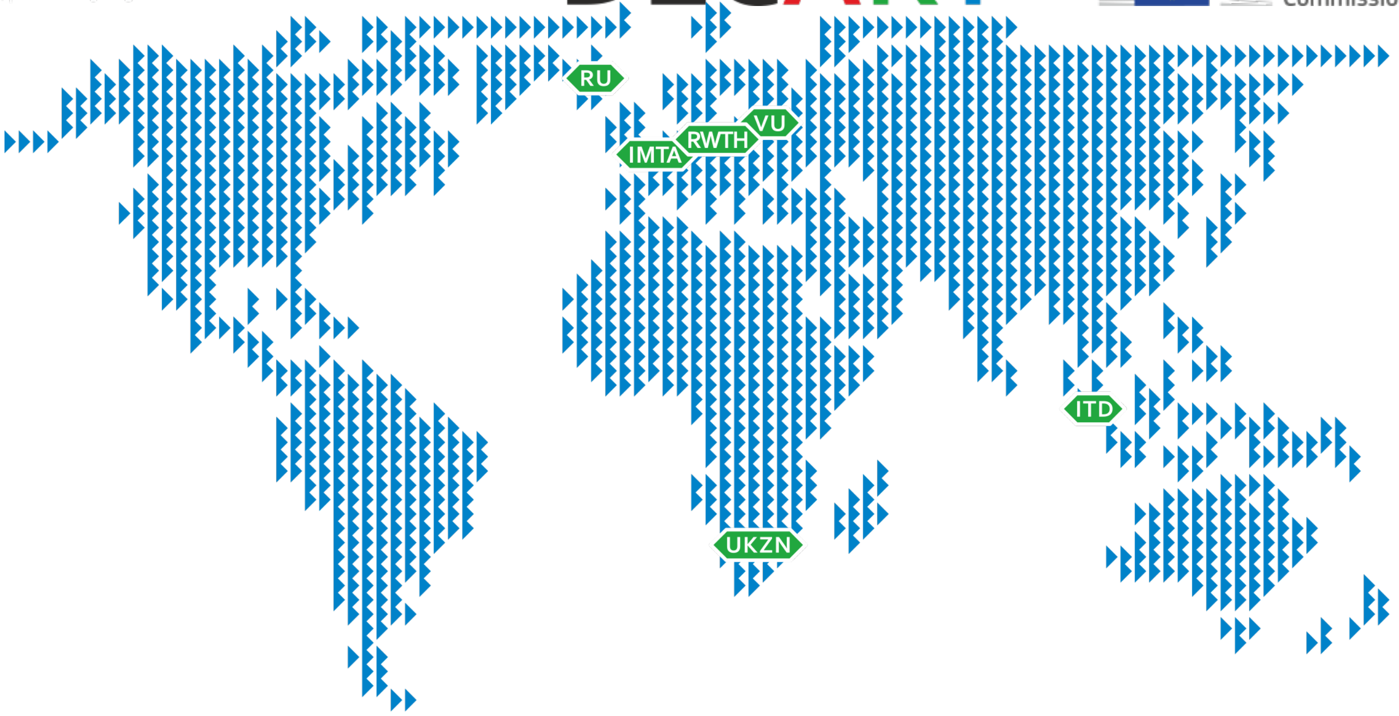

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Mayelana ne-DECART

Iphrojekthi yocwaningo nokuqamba izinto ezintsha i-DECART iyinhlangano yokubambisana kwamazwe ngamazwe exhaswe ngaphansi kohlelo lwe-ERASMUS+ lweKhomishini yaseYurophu (2022-1-FR01-KA220-HED-000087657). Le phrojekthi ihlanganisa izikhungo zemfundo ephakeme zaseFrance, e-Iceland, e-Indonesia, eLithuania naseNingizimu Afrika. Inhloso enkulu yephrojekthi ukuhlinzeka ngemihlahlandlela yokuklama izinhlelo ezintsha zokuqeqesha ezisebenzisa amandla okuguqula ezinhlelweni zemfundo yanamuhla yekhulunyaka lama-21, ikakhulukazi emkhakheni wobunjiniyela nezamabhizinisi. Le phrojekthi izophinde ihlonze izindlela zobuholi ezingasiza abathintekayo kwezemfundo ukuba baphumelele esimweni sezomnotho nezenhlalo esiya siba nzima ngokwengeziwe.

Umhlangano wephrojekthi wesi-5 eNyuvesi yaKwaZulu-Natali

Ithimba le-DECART eNYuvesi yaKwaZulu-Natal Isithombe: UPhiko LwezoBudlelwano e-UKZN

Umhlangano wesihlanu wephrojekthi ye-DECART ubusingathwe yiNyuvesi yaseKwaZulu-Natali (UKZN), eNingizimu Afrika, ngoJanuwari 2025. Lo mhlangano wawuholwa ngofundisi bakwa-UKZN: uCecile Gerwel Proches, uMacdonald Kanyangale, kanye no-Angela James (WP3). Lo mcimbi wahlanganisa ozakwethu abavela eYurophu naseNingizimu Afrika emihlanganweni wokusebenza ngokubambisana, ukwenziwa kwezethulo nokuthola isikhathi sokuqhamuka nezinhlelomasu, konke lokhu kwenzeka nje ezinsukwini ezintathu. Lo mhlangano wenzeka ngokusebenzisa izinkundla ezimbili ezahlukene njengoba amanye amalungu ayo le phrojekthi ye-DECART ayengene kuwo ngokusebenzisa ezobuchwepheshe.

Umcimbi wokuvula waba ngomhla wama-28 kuMasingana wezi-2025 waqala ngokwemukelwa kwezivakashi ngezandla ezifudumele wubuholi obuphezulu base-UKZN. Abebekhona bafaka phakathi othisha basenyuvesi abavela emikhakheni eyahlukene, kwezesayensi nezinhlaka zobunjiniyela (STEM), kanye nakwezemfundo, ama-DVC (amaPhini eSekelashansela), amaDini nabanye abaholi abaphezulu. Ithimba le-UKZN laqhuba ama-workshop okuxhumana nababekhona, egxile ohlelwenii lwesithathu lwephrojekthi ye-DECART, olugxile ekuguqulweni kohlelo lwezifundo nasebuholini. Ababambe iqhaza bahlolisise izindlela uhlelo lobuholi oluvimbela noma olukhuthaza ngazo ukuguqulwa kohlelo lwezifundo.

Ithimba le-DECART e-UKZN. Isithombe: UPhiko Lwezobudlelwano Lwase-UKZN

Uhlelo lomhlangano lwalugxile ekuhloleni ukuthi imfundo ephakeme ingazivumelanisa kanjani nezinhlelo zayo zezifundo nezakhiwo zayo ukuze ichume emhlabeni ongenazinzo, ogcwele ukungaqiniseki, onzima futhi onokungacaci (i-VUCA). Ngokuhlanganiswa kwezingxoxo ngombono nezikhathi zokusebenza ezisebenzayo, ababambe iqhaza bahlolisise izinselelo ezintsha ezivela ekwakhiweni kwezifundo, babelane ngolwazi lwemfundo ezikhungweni zabo, baphinde bazama amathuluzi okweseka ukuguqulwa kwesu ngendlela eqondile.

Amalungu ephrojekthi ye-DECART aphinde athola ithuba lokuhlola amakhempasi ase-UKZN, ahlangana nabasebenzi nabafundi, futhi avakashela iZikole/nemiNyango eyahlukahlukene. Aphinde avakashela i-UKZN Graduate School of Business and Leadership, i-Astrophysics Research Centre, iMicroscopy and Microanalysis Unit, i-WASH (Water, Sanitation & Hygiene Research & Development Centre), uMnyango Wezobunjiniyela Bemishini neqembu le-Aerospace, iMaths and Stats, kanye neCentre for Creative Arts.

Ithimbale-DECART livakashela amakhempasi ase-UKZN. Isithombe: sathathwa uCecile Gerwel Proches

Ukuze uthole olunye ulwazi mayelana nalo mhlangano, bheka:
[I-UKZN Ibisingethe Izivakashi Zamazwe Ngamazwe Emhlanganweni Wephrojekthi ye-DECART WezeMfundo Ephakeme]

Ukubambisana kweYurophu neNingizimu Afrika

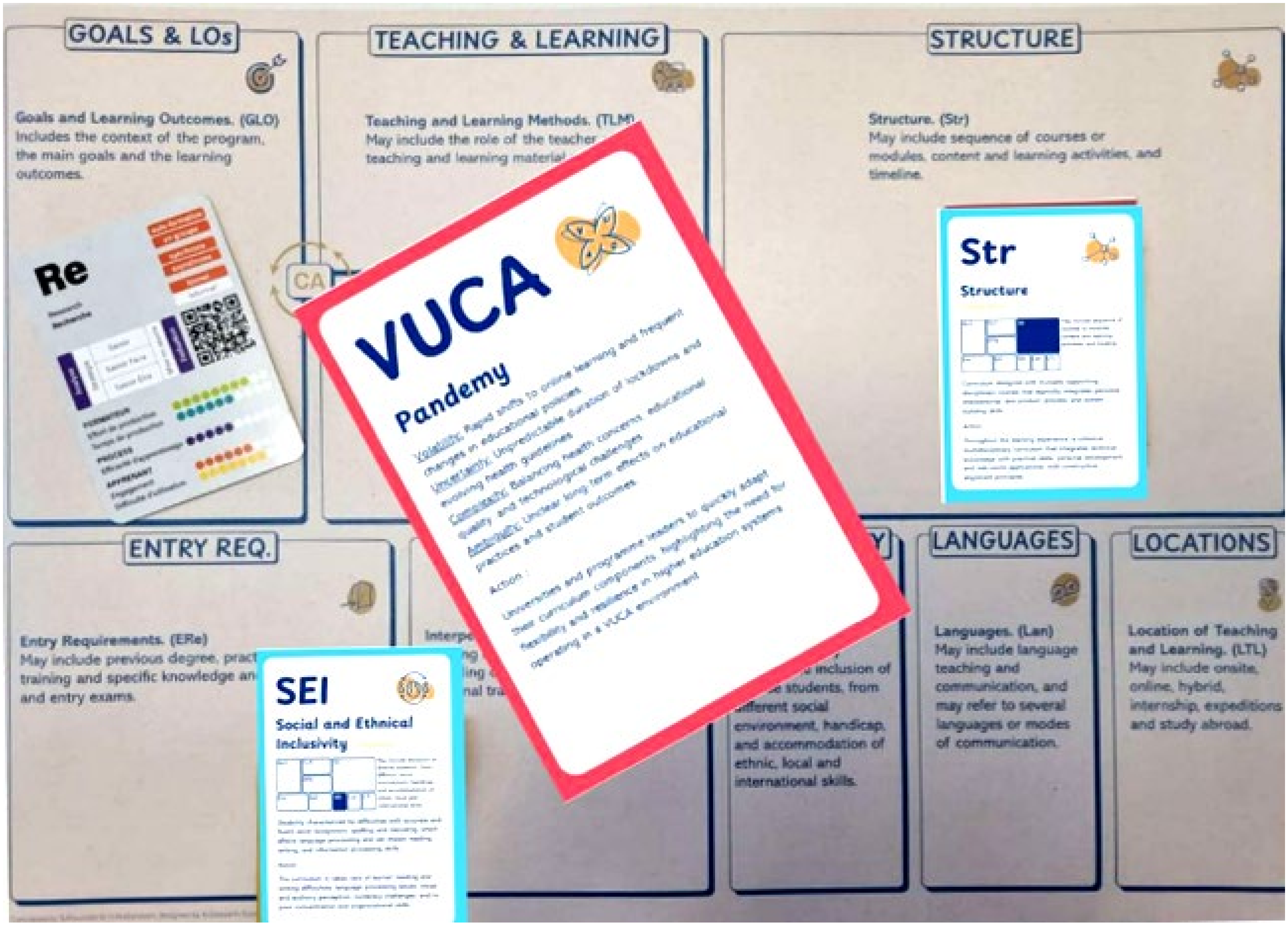
Okwakugxilwe kakhulu kukho ohlelweni lwe-PM5 kwaba wukuqinisa ukubambisana phakathi kwezikhungo zemfundo ephakeme zaseYurophu naseNingizimu Afrika. Lokhu kubambisana kwakhiwe phezu kwemigomo yokufunda ngokubambisana nokuthuthukiswa ngokuhlanganyela, futhi kusekelwe ezintweni ezifanayo ezinzima nezinhlobonhlobo zezinto ezihlangenwe nazo.

Ingosi eyingqayizivele eyinqubonkolelo yaseNingizimu Afrika ewumsukamqondo yohlelo lo **Ubuntu**, ehumusheka ngokuthi "umuntu ngumuntu ngabantu." Le nzululwazi yobuntu yagqugquzela umoya womhlangano, yagcizelela ukuxhumana, isibopho sobumbano, kanye nobuntu obuhlanganyelwe ekwakhiweni kwezinhlelo zezifundo. Ozakwethu baseYurophu banikele ngolwazi lokuhlelwa kohlelo, ukuqinisekiswa, kanye nokuhlanganiswa kwezobuchwepheshe bedijithali, kanti izikhungo zaseNingizimu Afrika zanikeza ukuqonda ngendlela yokuphatha imfundo ngaphansi kwezinhlelo ezingalingani, izimo zokuwa kwezimiso, kanye noguquko lwezenhlalo.

Lobu budlelwano phakathi kwezizwe bacebise isisekelo somqondo wephrojekthi futhi bakhuthaze indlela eqondiswe ngamanani ekuvuseleleni imfundo ephakeme ehambisana nezindinganiso zomhlaba wonke kanye nezimo zomphakathi wendawo.

WP1 –Ukuchaza Izisekelo Zokwakha Uhlelo Lwezifundo Olusimeme

Iphakheji Lomsebenzi 1 (WP1) idlala indima ebalulekile kuphrojekthi ye-DECART ngokuthuthukisa uhlaka oluqinile, olusekelwe emithethweni nakwisipiliyoni esisebenzayo sokuklama uhlelo lwezifundo oluzinzile. Ngokususelwa ekuhloleni izincwadi, ezivivinyweni ezwenikazi, nasekuhlaziyweni kwezikole, i-WP1 yachaza izici ezibalulekile ezichaza izinhlelo zezifundo ezizinzile, kuhlanganise nokuguquguquka, ukuvumelana, ukuhlukaniswa kube yizigaba, ukuzivumelanisa nezimo, kanye namasiko aqinile ekusebenzeni kahle. Lolu lwazi laqoqwa lwaba yinto ebizwa ngokuthi “i-curriculum canvas” — ithuluzi elivumela izikhungo ukuba zihlele futhi zizihlolise ngokwazo izakhiwo zezinhlelo zazo zezifundo kanye nokulungela ukuzivumelanisa nengcindezi engaphandle (isb., izinguquko zenqubomgomo, ukuphazamiseka kobuchwepheshe, ukuhluka kwabafundi). I-WP1 iphinde yabhala ukuthi izinhlelo zokwamukelwa kwezifundo ezihlukahlukene kanye nezindlela zokuphatha zithinta kanjani ukuguquguquka kohlelo lwezifundo emazweni abambisene. Imiphumela ye-WP1 ibalulekile ekuqinisekiseni ulimi oluvamile kanye nesisekelo somqondo phakathi kwawo wonke amalungu ephrojekthi, futhi iyisikhokelo samathuluzi nezinhlelo ezakhiwe ku-WP2 nase-WP3.

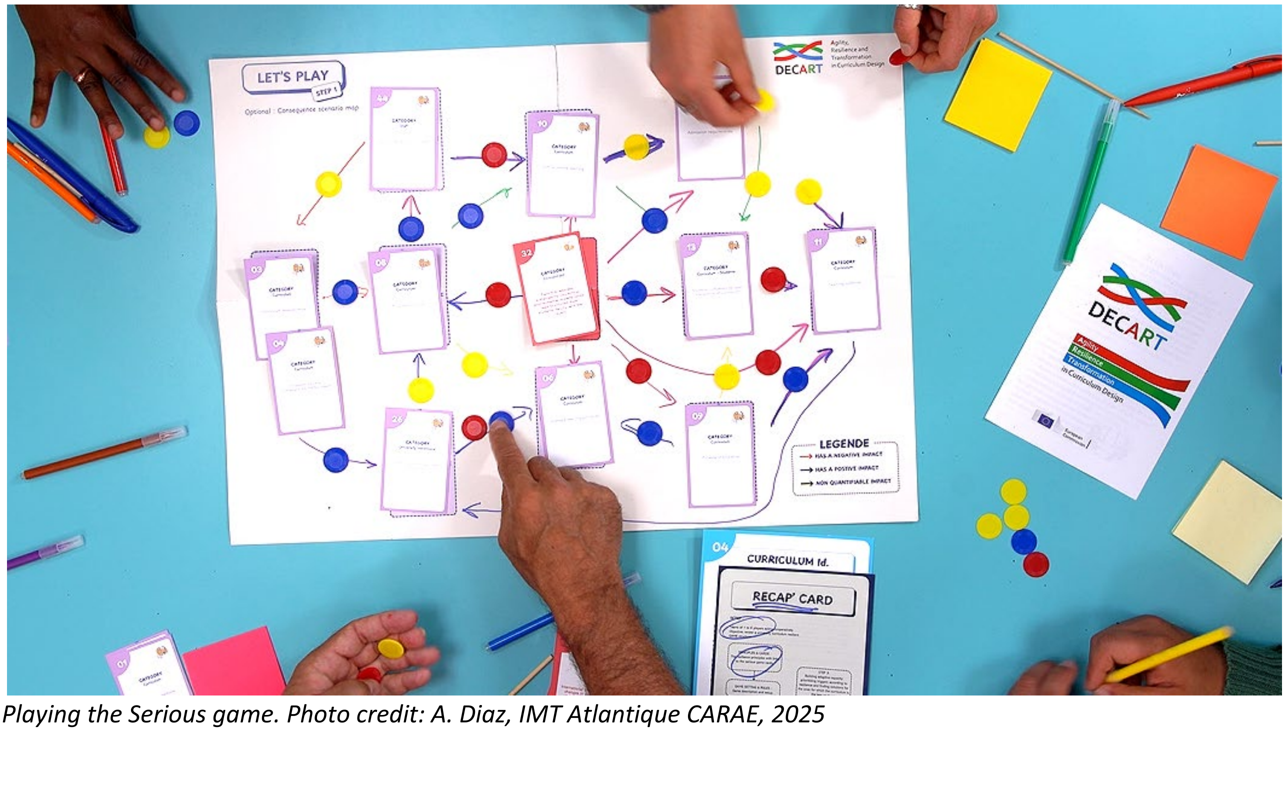


Isithombe: Sathathwa uSiegfried Rouvrais, ngowezi-2025

I-WP2 - Ukusuka Emqondwenimsuka Kuya Ekusetshenzisweni Kwawo: Izinsiza Zokuthatha Izinqumo Kanye Nomdlalo Wezemfundo Osimeme

Enye yezinto ezisemqoka ezizolethwa wuphenyo lwe-WP2 **amathuluzi amabili okusiza ekuthatheni izinqumo**: (1) umbuzo wokuzihlola ozogcwaliswa abasebenzi bezemfundo, uhlose ukukala izinto ezifana nokuguquguquka kwezindlela zokufundisa, ukuphindaphindwa kwendlela yokuletha okuqukethwe, nokuphendula ngokushesha ezinguqukweni; (2) uhlaka lokuhlaziya imiphumela ukuze kutholakale laphokunobuthakathaka khona. Ngokwakhela phezu kwalokhu, i-WP2 ibambisene nabanye ekwakhiweni komdlalo wezemfundo oyingqayizivele, okhombisa izinselelo zangempela — ezifana nokuphazamiseka okubangelwa yi-AI, ukuvalwa kwezikole ngenxa yobhubhane, noma izinguquko ezisemthethweni — ezisetshenziswa njengemisebenzi eqhuba ukufunda ngendlela eguquguqukayo. Abadlali kudingeka bahlole imithelela, babone ubungozi, futhi bathuthukise izindlela zokwenza — ngaleyo ndlela bazibonele izinguquko kuhlelo lwezifundo ezibandakanyayo, endaweni enobungozi obuncane. Lo mdlalo uhleleke ngefomethi yomlando kanye namakhadi ezinqumo, futhi kuhloswe ngawo ukuthi ube yithuluzi lokuthuthukisa abasebenzi kanye nomhlahlandlela wokuhlela isu. Ukuhlelwa kwawo okuqhubekayo kubandakanya impendulo evela kubo bonke ababambisene nabo ukuqinisekisa ukufaneleka kwawo endaweni ngayinye kanye nomthelela wokufundisa.

R. Waldeck from IMT Atlantique giving a speech on the Resilience Serious Game. Photo credit: Siegfried Rouvrais, 2025



Playing the Serious game. Photo credit: A. Diaz, IMT Atlantique CARAE, 2025

I-WP3 – Ukuxoxisana Kobuholi Nababambiqhaza Mayelana Noguquko Ohlelwenizifundo

I-Work Package 3 (WP3) yagxila ezinhlakeni zabantu nezamasu amayelana noguquko ohlelwenizifundo, ikakhulukazi ubuholi, ukuthatha izinqumo, nokubandakanya abathintekayo. Ihlaziya izimbangela nezithiyo ekuhlanganiseni uhlelo lwezifundo, ezifana nokushoda kwezinsiza, ukumelana nezinguquko, kanye nesakhiwo sobuholi esihlakazekile. Iphinde ibonise abathintekayo ababalulekile bangaphakathi nangaphandle — kuhlanganise nothisha, abafundi, abaphathi, abaqashi, nabenzi benqubomgomo — okumele babambe iqhaza ukuze impumelelo ifinyelelwe. i-WP3 iphakamisa izindlela zobuholi ezisekelwe ekusebenzisaneni, ukuhlakanipha kwemizwa, umbono wesikhathi eside, kanye nokucabanga ngohlelo oluphelele. Enye yezinhloso ezinkulu ukwenza ngcono amakhono wobuholi ezikhungweni ukuze zikwazi ukuphatha izinguquko, zixhase ushintsho olubandakanayo, futhi ziqinise izinguquko zesikhathi eside. Ukuze kufike kelsisiphetho, i-WP3 ithuthukise intuthuko yomqolo wobuholi futhi yaqala uchungechunge lemikhando eyakhelwe ukuthuthukisa abaholi bezemfundo ngamakhono, imicabango nangamathuluzi adingwa ubuholi obulungele ukubusa kusasa nentuthuko yohlelo lwezifundo.

Imisebenzi Ye-DECART Yamanyuvesi Asebenza Ngokubambisana

Yonke inyuvesi ebambisene nephrojekthi ye-DECART iye yabamba iqhaza ngokugcwele ekusabalaliseni lolu hlelo, ngaphakathi nangaphandle, ngokusebenzisa izinhlelo nemikhankaso eqondiswe ngqo.

IT DEL: Iseshini Yokwebelana – Iphrojekthi ye-DECART WP1

Ithimba lokuzilolonga labalolongi (ToT) e-IT Del lahlela iseshini yokwabelana ngemiphumela esemqoka ye-WP1 yephrojekthi ye-DECART. Inhloso kwaba ukwabelana ngolwazi nokukhuthaza ukubamba iqhaza ekwakhiweni kwezifundo ezimelana nezinselelo zesikhathi esizayo eziqinile emfundweni ephakeme.

IT Del: Ukuhlolwa KweSerious Games Ithimba Le-IT Del

Njengengxenye yemisebenzi eqhubekayo ngaphansi kwe-WP1, Ithimba lokuzilolonga labalolongi le-ToT e-IT Del laphinde laqhuba enye iseshini egxile ezindleleni ezintsha zokuhlela uhlelo lwezifundo. Kube negxathu lokwethula umdlalo i-*SUCRE (SUpporting CUrriculum REsilience)* — umdlalo wokubambisana okhuthaza ukuqina lohlelo lwezifundo emfundeni ephakeme. I-SUCRE unikeza ithuba lokusebenzisana lapho abahlanganyeli bephendula ngokusebenzisana kwizinhlobonhlobo yezehlakalo ezinomthelela ezinhlelweni zemfundo. Ngenxa yokuhlela okunesu, umdlalo ukhulisa ukucabanga okunobuhlakani futhi ugqugquzele uguqulo lwesikhathi eside lwesakhiwo lohlelo lwezifundo.

UKZN: Ukuhlola Uhlelo Lwezifundo Ze-VUCA

NgoMbasa 2025, ithimba le-DECART e-UKZN lahlela umkhando eYunivesithi yaKwaZulu-Natal eThekwini, eNingizumu Afrika. Umcimbi ubambisene nehhovisi lokufundisa nokufunda (UTLO) laseUKZN. Umkhando kwaba uhloswe ekuvumelweni kwabahlanganyeli ukuba bakwazi ukuqonda ukuthi imicimbi injenge-VUCA inomthelela kangakanani kuhlelo lwezifundo futhi yakhelwa ukuthi abahlanganyeli bahlole sishlathulelo zengxenyesakhiwo yokwakha

Isithombe: Arlinta Barus, 2025

uhlelozifundo olusimeme oluhlanganisa imicimbi yeVUCA efana ne-(WP1, WP2).

Izithombe zababebambiqhaza kule Nkuthazakwenza. Isithombe: UPhiko LwezoBudlelwano Lwase-UKZN

Inkuthazakwenza Yoguquko Lohlelozifundo kanye Nokuxoxisana Kwababebambiqhaza e-UKZN.

NgoNhlaba wezi-2025, ithimba le-DECART e-UKZN lahlela inkuthazakwenza ngokubandakanyela kwabathintekayo nenguquko ohlelweni lwezifundo (WP3) eNyuvesi yaKwaZulu-Natali (UKZN) eThekwini, eNingizimu Afrika. Lo mcimbi wawuhlelwe ngokwesekwa yiHhovisi lezinhlelo zokuFunda nokuFundisa (UTLO). Izihambeli zathola ithuba lokuhlaziya ababebambiqhaza okwakuhlanganisa nokucubungulisisa izithombe ezibalulekile (insizakucabanga yezinhlelo), ukuhlonza ababambiqhaza kanye nentshisekelo nokukhathazeka kwabo.

Ababambiqhaza besebenzisa izithombe. Isithombe: sithathwe uCecile Gerwel

Ukuqonda ukuqina kohlelo lwezifundo: Ividiyo Ephuma e-IPHSE2 e-Aachen

Ithimba elaziwa ngokuthi yi-*Gender and Diversity in Engineering* e-RWTH Aachen University lahlela umhlangano we-DECART ngenyanga kaZibandlela wezi-2024. Kwenzeka umsebenzi wokuthuthukisa nokuhlola umdlalo wezemfundo (serious game) oqhathanisa izinselelo zemvelo ye-VUCA ekuhlelweni kohlelo lwezifundo ezihambisana nezigaba ezahlukene. Le ndlelakwenza esekelwe umdlalo inikeza ababambisene nabo ukuqonda okusebenzayo mayelana nezinguquko kuhlelo lwezifundo, futhi inikeza imininingwane ewusizo emisebenzini eqhubekayo yephrojekthi.

Okunye okwakugxilwe kukho kulomhlangano kwakuwukuthuthukiswa kwethuluzi lokwenza izinqumo, elizosekela amanyuvesi ekuhloleni nasekuqiniseni izinga lohlelo lwezimfundo zawo ngendlela ehlelekile.

Ngaphezu kwale misebenzi, kwenziwe ividiyo ekhombisa umsebenzi we-IPHE2 e-Aachen, ehlinzeka ngombono ojulile ngomsebenzi wobabambisene nabo iphrojekthi kanye nemiphumela esemqoka yalomhlangano:
https://www.youtube.com/watch?v=4Qgl_gE-JlQ&t=1s

Izincwadi Ezishicileliwe

UMhlangano we-PM5 uphinde wahlola izindlela zokusabalalisa ulwazi nezincwadi ezizoshicilelwa maduze. Kulungiselelwa ama-athikili ezemfundo amaningi kanye nemibiko yenqubomgomo, egxile ezihlokweni ezifana nokuqina kohlelo lwezifundo, ukusebenzisa imidlalo ekuhlelweni kokufunda, kanye nobuholi obubandakanyayo. Ababamisene nabo baphinde baxoxa ngokubamba iqhaza emihlanganweni yamazwe, imicimbi yokubandakanya abathintekayo, kanye nezinkundla zokwabelana ngolwazi. Inhlangano yephrojekthi ihlose ukufinyelela izethameli ezifundisayo kanye nezingcweti ezisebenzayo, iqinisekisa ukuthi imiphumela ye-DECART inethonya kunqubomgomo nasekusebenzeni kwezemfundo ebanzi e-Europe naseNingizimu Afrika.

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Siyakwamukela emhlanganweni wokugcina we-PM6 kanye ne-IPHE3 eVilnius University

Umhlangano wokugcina we-PM6 uzoba mhla ziyi-7 kuya mhla wesi-8 kwekaNtulikazi, kuthi i-IPHE3 ilandele mhla ziyi-9 kuya mhla we-10 kwekaNtulikazi wezi-2025.

Isithombe: Valentina Dagienė, Vilnius university, 2025

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The DECART project partners acknowledge the grant support received under the Erasmus+ Programme
(number 22022-1-FR01-KA220-HED-000087657)

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