

Remote sensing based assessment of woody biomass and carbon storage in forests



RemBioFor

R&D project, which aim is to work out the complex method of defining selected forest stand descriptions as well as aboveground biomass and carbon sequestration, based on the use of remote sensing for the purposes of forest management planning.

The aim of the project was to work out the complex method of defining selected forest stand descriptions as well as aboveground biomass and carbon sequestration, based on the use of remote sensing for the purposes of forest management planning.

Among main goals were:

- acquisition and processing of remote sensing, laboratory and field data,
- determining the amount of biomass and carbon in the forest based on radar data,
- development of methods for the inventory of selected stand descriptions, growing stock and biomass with the use of active remote sensing techniques,
- local correction of dendrometric volume equations based on terrestrial laser scanning data (TLS),
- development of the merchantable volume conversion factors into biomass and carbon.

Results of the project allow to: reduce time needed to carry out the work of the forest management, especially inventory of growing stock; obtain higher accuracy of the CO₂ balance, biomass and annual allowable cut calculations; determine growing stock for any forest area; reduce cost of field work in forest management.

DETALII

SURSA DE LEMN

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TIPUL DE LEMN

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TIPUL DE LEMN ÎN CAUZĂ

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IMPACTUL ASUPRA MEDIULUI ȘI BIODIVERSITĂȚII

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EFFECT ASUPRA VENITURILOR

--

POTENȚIAL DE EXPLOATARE

--

HUB

Hub central-est

IMPACT ECONOMIC

--

CUNOȘȚINȚE SPECIFICE NECESARE

--

POTENȚIALUL DE MOBILIZARE

--

POTENȚIAL DE SUSTENABILITATE - VALOARE

--

FACILITATEA DE IMPLEMENTARE

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FACILITATEA DE IMPLEMENTARE - EVALUARE

--

CONDIȚII CHEIE PREALABILE

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TIPUL DE EVENIMENT LA CARE A FOST PREZENTAT ACEST IPB

Vizita de studiu (T2.3)

EFFECT ASUPRA LOCURILOR DE MUNCĂ

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COSTURI PENTRU IMPLEMENTARE (EURO - €)

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MAI MULTE DETALII

PROVOCARE ABORDATĂ	DOMAIN	TIP DE SOLUȚIE
1. Îmbunătățirea rezilienței pădurilor și adaptarea la schimbările climatice	Inventariere, evaluare, monitorizare Managementul pădurilor, silvicultura, servicii ecosistemice, reziliență Cercetare și dezvoltare	Modelare, DSS, simulare, optimizare
CUVINTE CHEIE	SOLUȚIE DIGITALĂ	INOVAȚIE
remote sensing techniques; carbon sequestration; forestry	Da	Da
ȚARA DE ORIGINE	SCARA DE APLICARE	ANUL DE ÎNCEPUT ȘI DE SFÂRȘIT
Polonia	Național	2015 - 2018

DATE DE CONTACT

PROPRIETAR SAU AUTOR
Instytut Badawczy Leśnictwa
Krzysztof Stereńczak
K.Sterenczak@ibles.waw.pl
<https://www.ibles.pl/>

REPORTER
Łukasiewicz Research Network - Wood Technology Institute (ITD)
Dobrochna Augustyniak-Wysocka
dobrochna.augustyniak@itd.lukasiewicz.gov.pl

REFERENCES AND RESOURCES

PAGINĂ WEB
<http://rembiofor.pl/en/>

RESURSE
Parkitna K., Krok G., Lisańczuk M., Mitelsztedt K., Ukalski K., Magnussen S., Markiewicz A., Miścicki S., Stereńczak K. 2021. Modelling growing stock volume of forest stands with the use of selected LiDAR Area Based Approaches in various predictive models. *Forestry: An International Journal of Forest Research*

WEBSITE PROJECT

<http://rembiofor.pl/en/>

REFERINȚĂ PROIECT

Remote sensing based assessment of woody biomass and carbon storage in forests (REMBIOFOR), National Centre for Research and Development within the program „Natural environment, agriculture and forestry” BIOSTRATEG, agreement no. BIOSTRATEG1/267755/4/NCBR/2015



PROIECTUL ÎN CADRUL CĂRUIA A FOST CREATĂ ACEASTĂ FIȘĂ INFORMATIVĂ

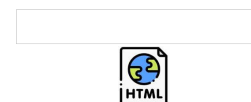
Rosewood 4.0

DATA POSTĂRII

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A TOOL FROM ROSEWOOD 4.0, DESIGNED AND DEVELOPED BY

