



COTOPAXI FOOTWEAR COLLECTION UO SPORTS PRODUCT DESIGN CAPSTONE THESIS - DOUG HINTZE





HEY FRIEND!

FOOTWEAR SUSTAINABILITY OUTDOORS









WHY THIS IS IMPORTANT?



SUSTAINABILITY INCLUSION DO GOOD ADVENTURE

















REMNANT

RECYCLED

RESPONSIBLE





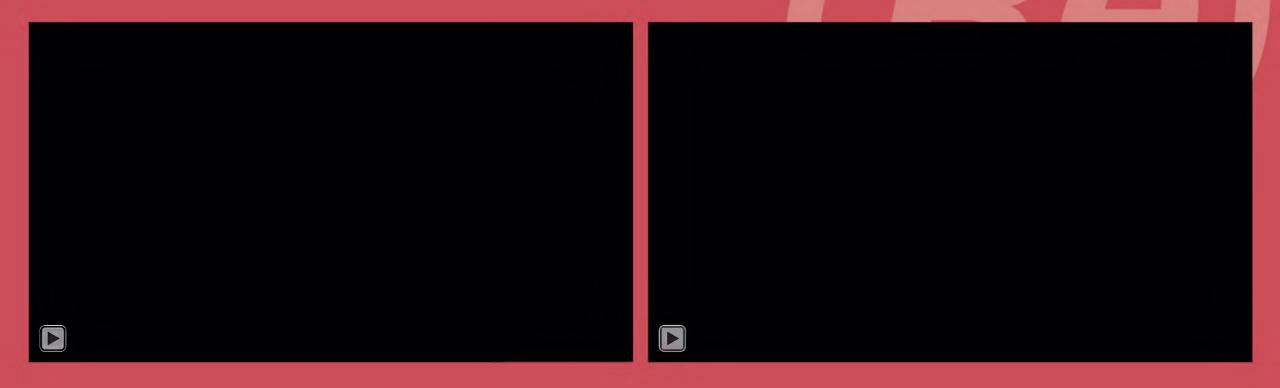
WHAT IS THE QUESTIVAL?

EDUCATION - DO GOOD - ADVENTURE - 24 HOURS





WHAT DO THESE ATHLETES NEED?











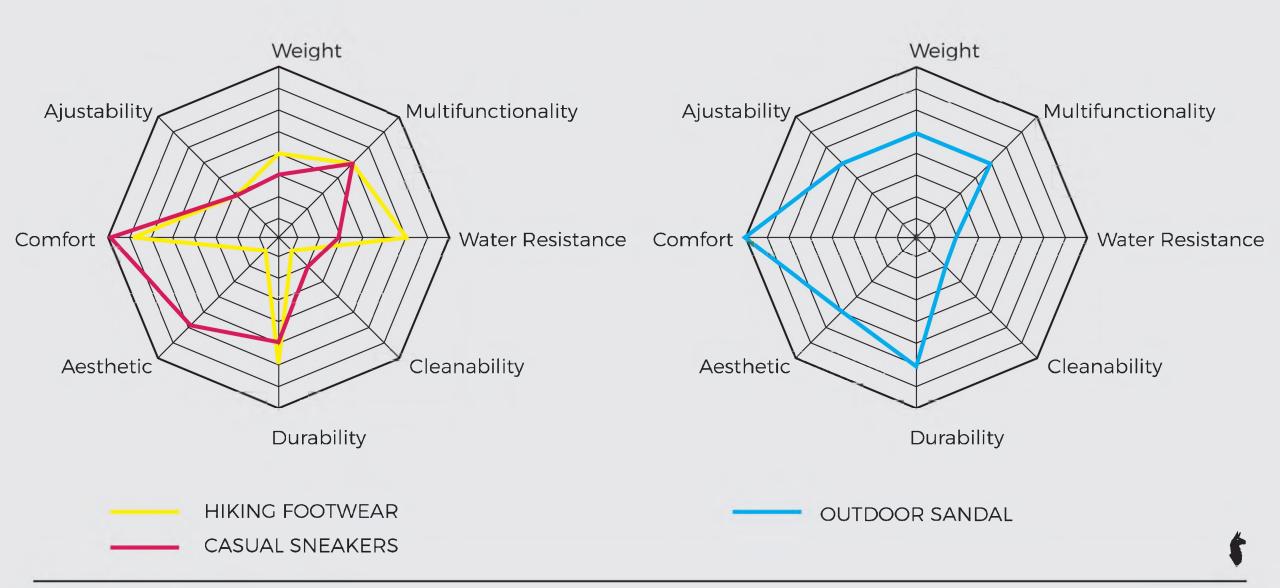






SURVEY RESPONDENTS ON CASUAL HIKING AND OUTDOOR SANDAL FOOTWEAR

SCALE OF IMPORTANCE





MAIN AREAS OF SWELLING: FOREFOOT (TOE EMPHASIS) - MIDFOOT/INSTEP

Cotopaxi Footwear





HOW CAN WE CREATE A SUSTAINABLE LINE OF ENTRY-LEVEL OUTDOOR HIKING AND TRAVEL FOOTWEAR FOR COTOPAXI WHILE ACHIEVING NECESSARY PERFORMANCE FOR THE OUTDOORS?



SENDERO (Re)Purpose



SEATTLE



MOAB





COZY QUEST





Comfort, recovery entry-level/ready to go footwear Concert, Travel, Base-camp, Casual Exlporation

POTENTIAL SHIFT TO TWO LOCATIONS









Casual and functional water resistant outdoor footwear Weather Ready, Street to Trail, Rainy Climate









Casual and functional breathable outdoor footwear Outdoor Ready, Street to Trail, Warm and Wet Conditions









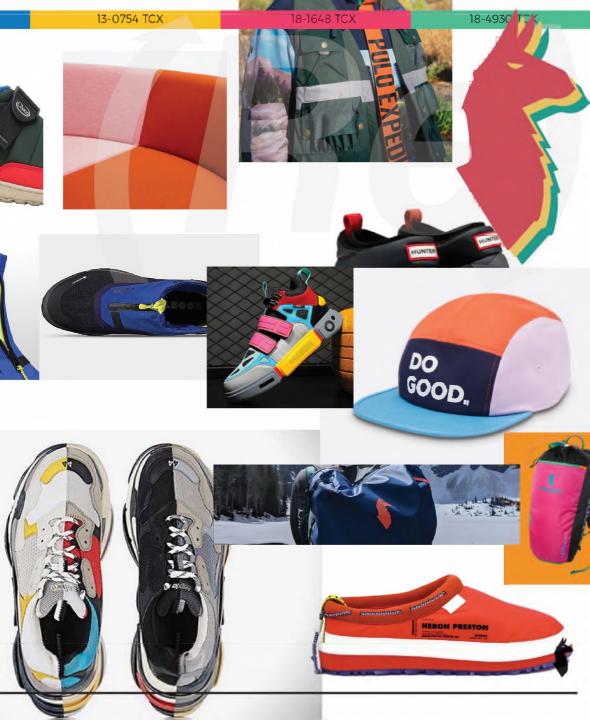


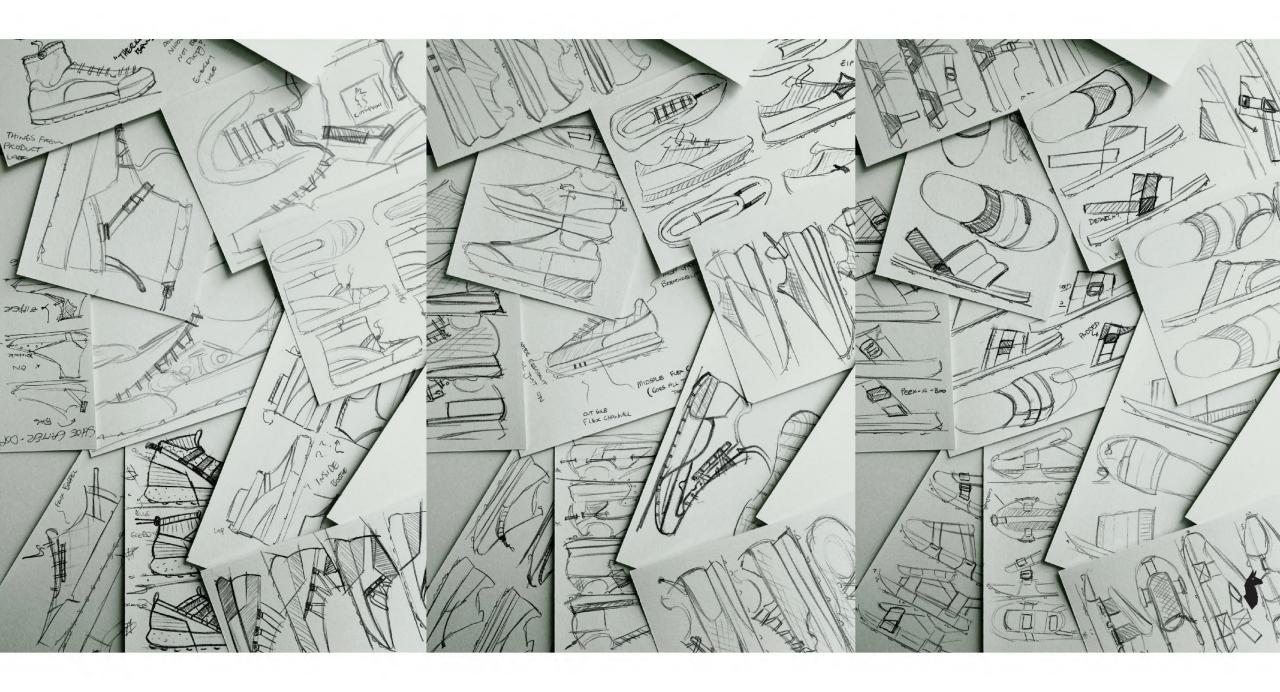


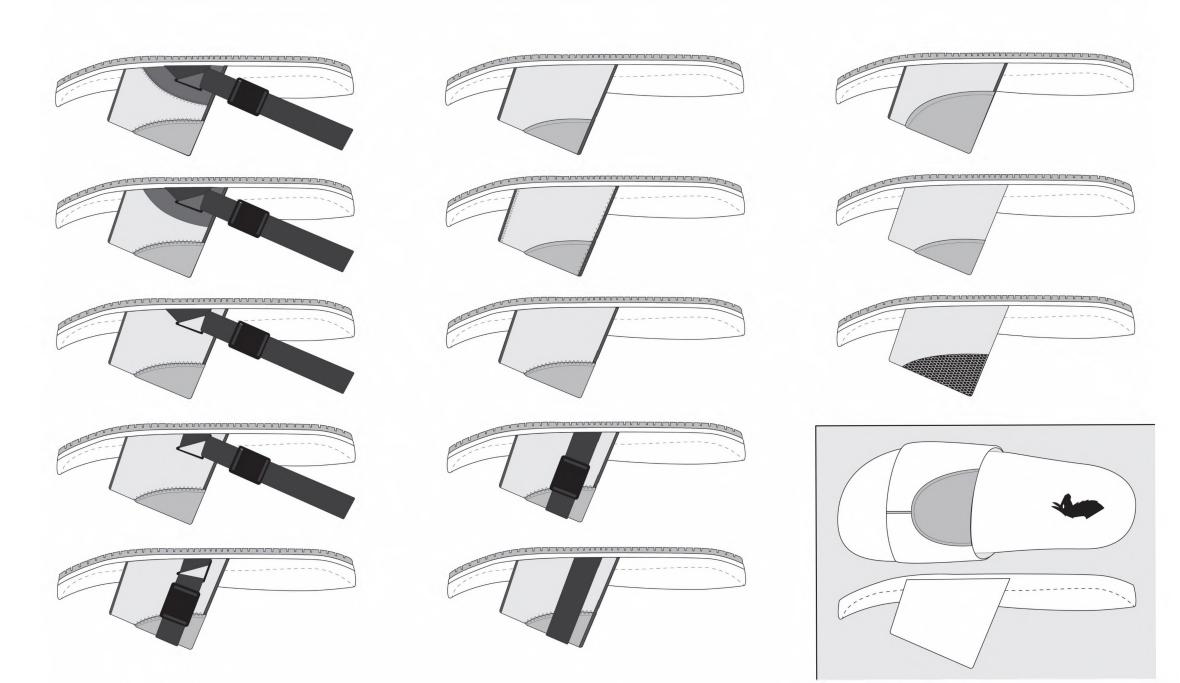












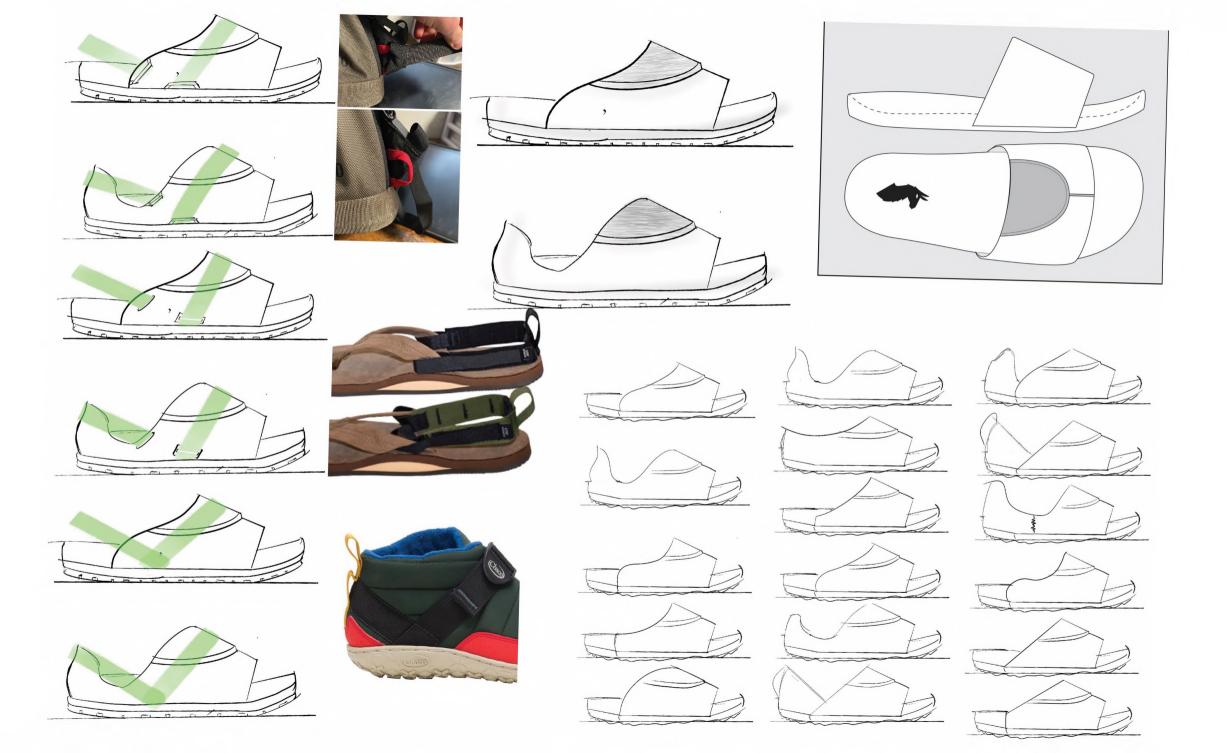








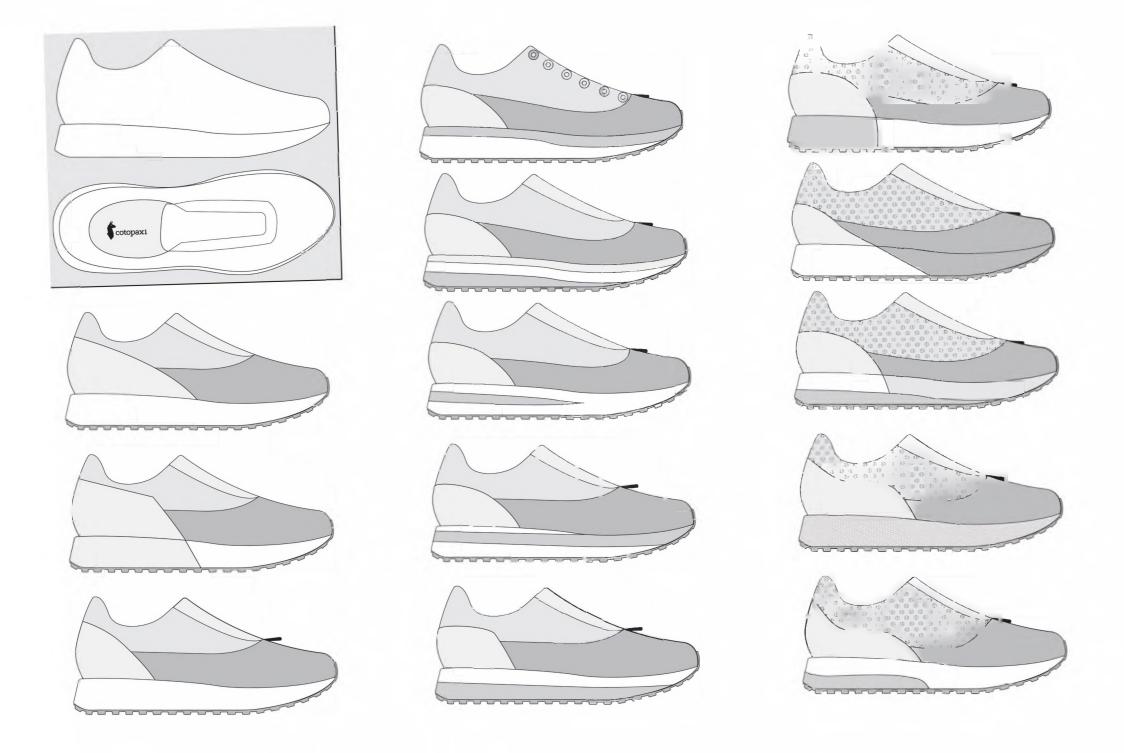








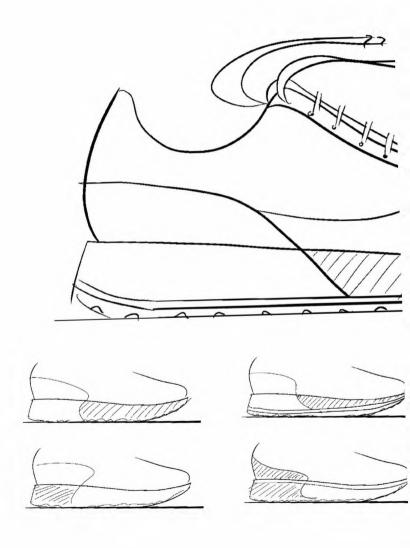


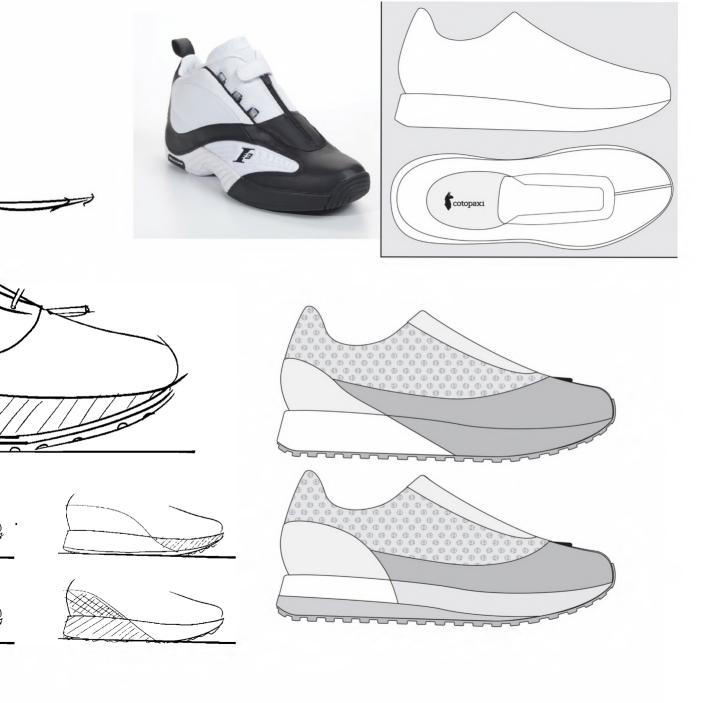










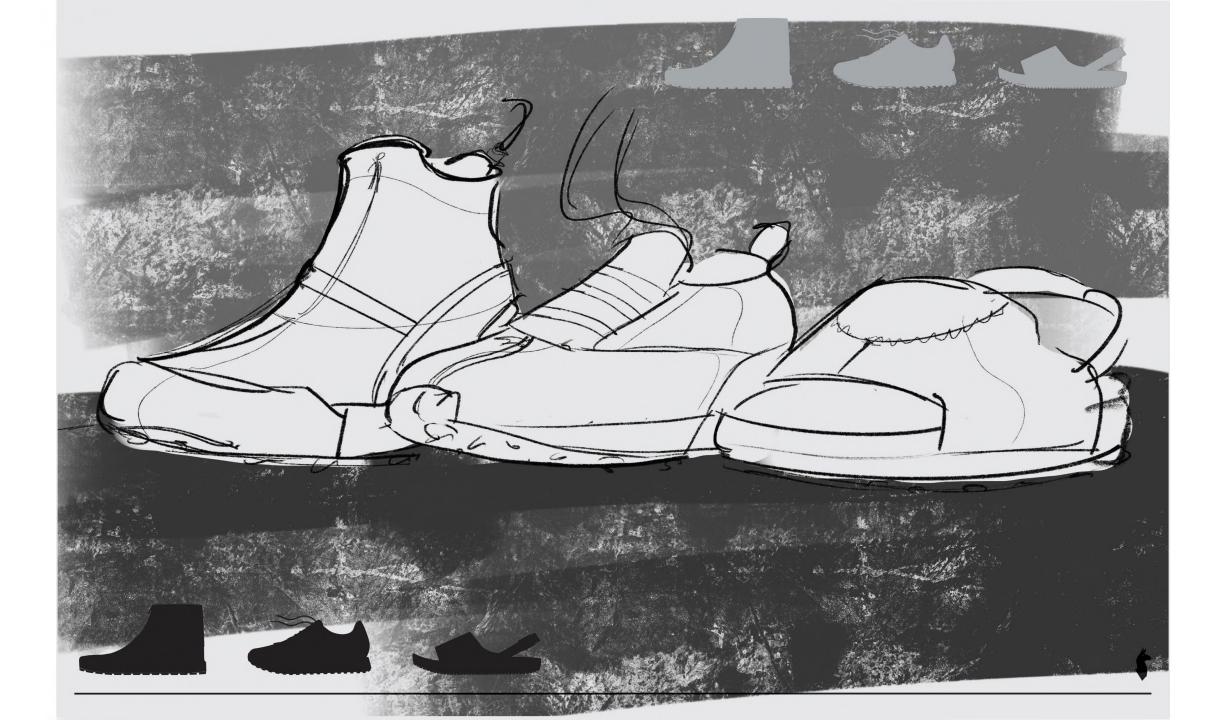




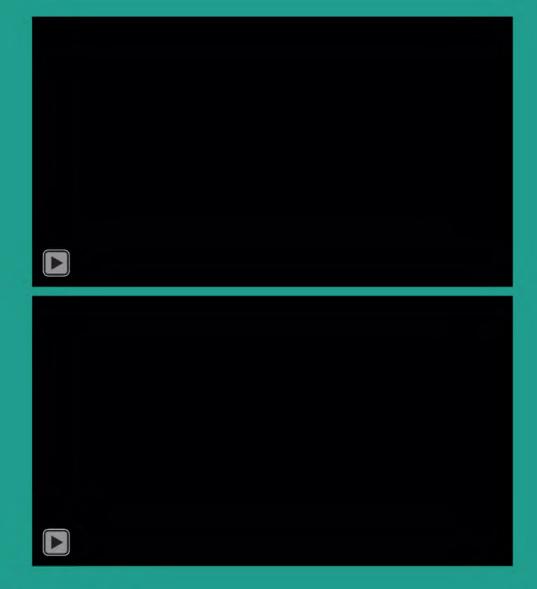






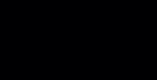


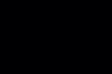




Cotopaxi Footwear









SAMPLES IN-MOTION

Gear For Good Sustainability



















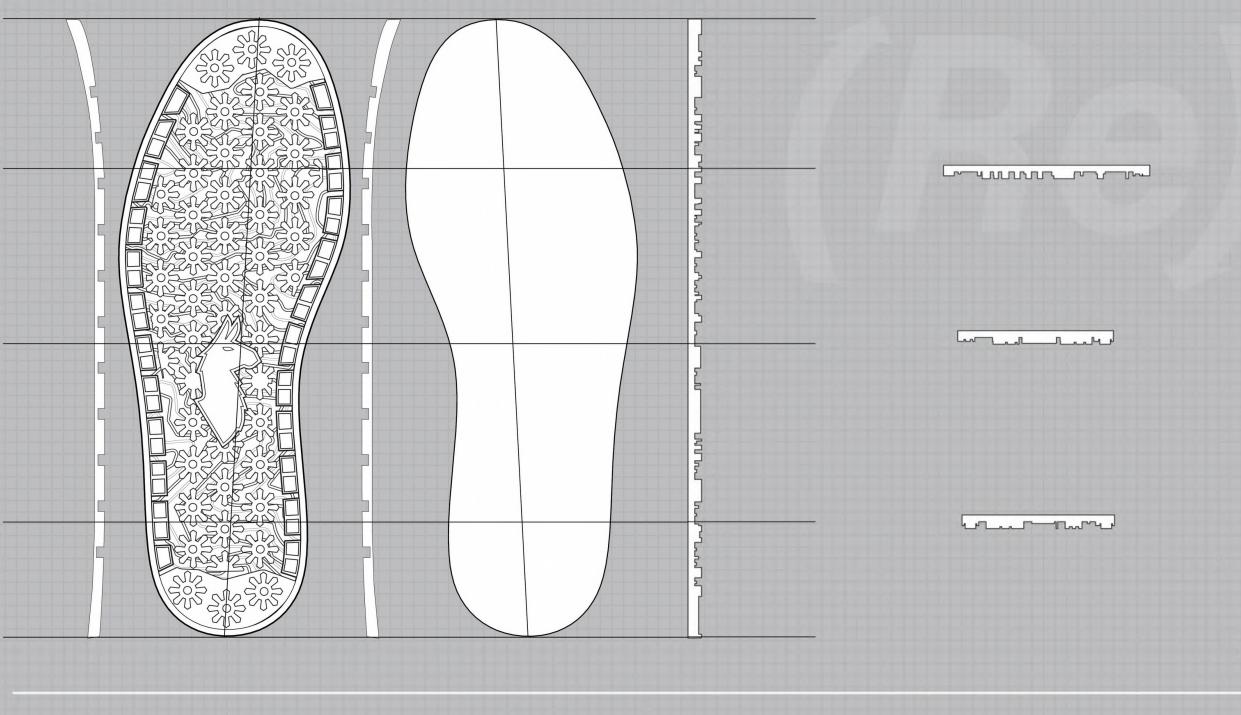


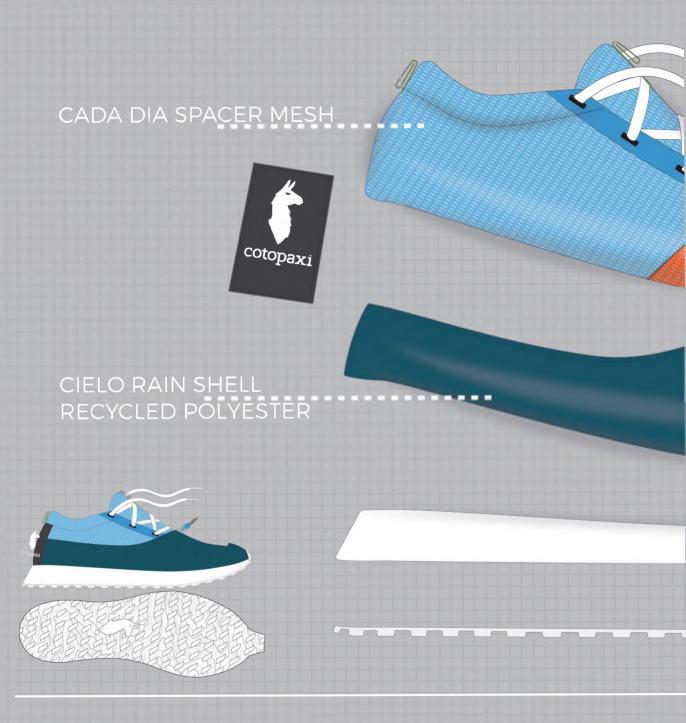


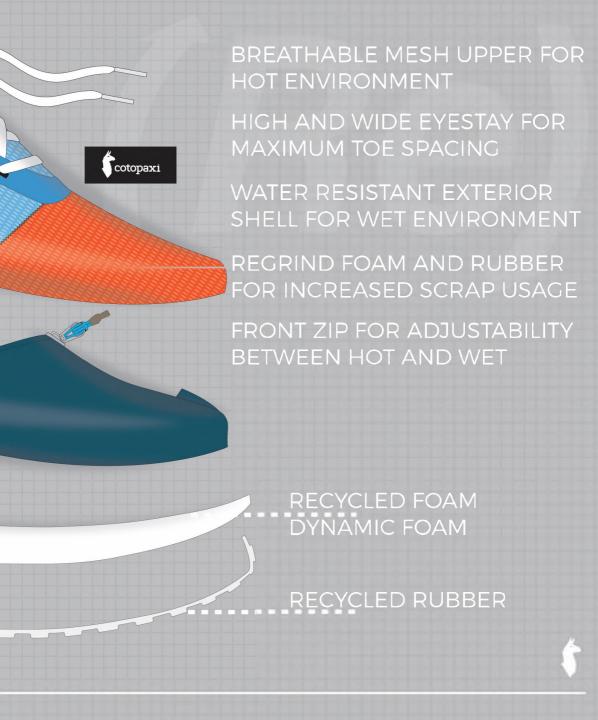


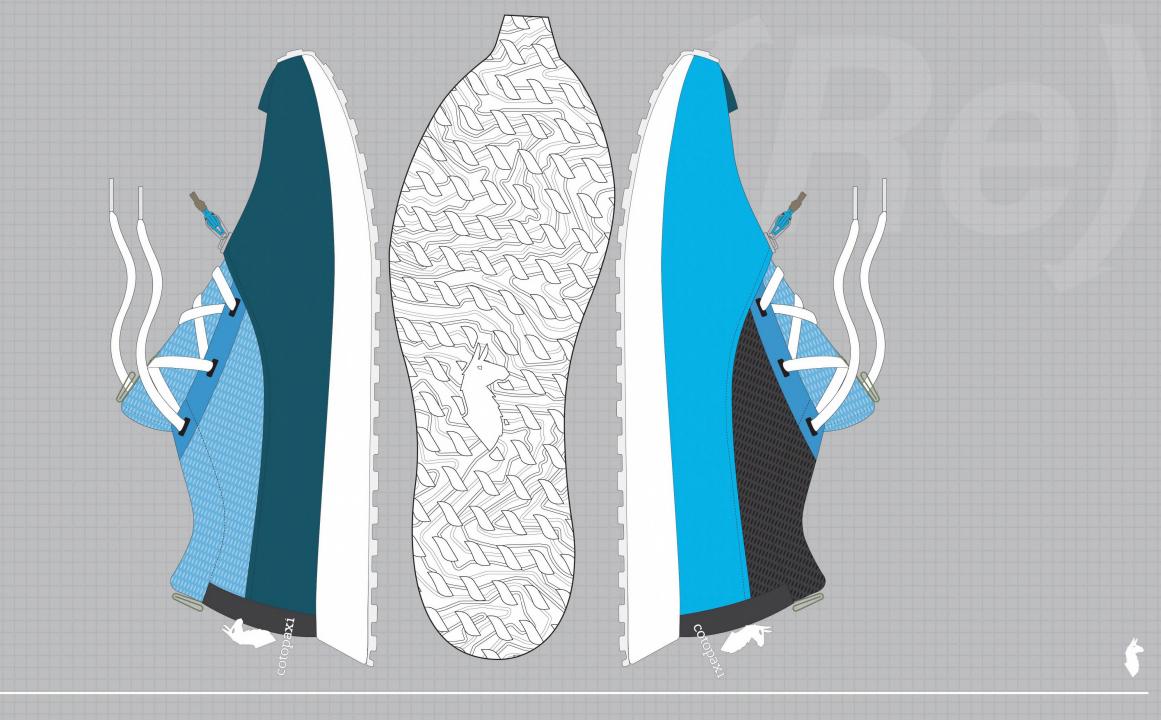


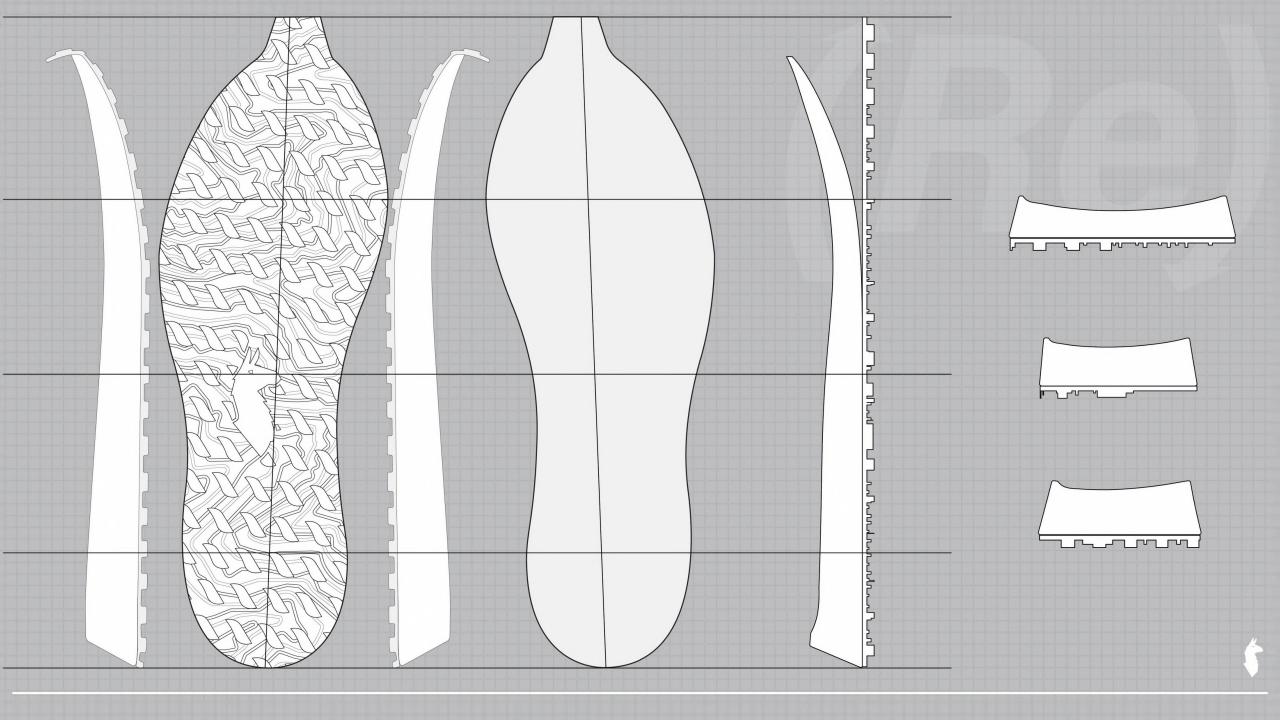


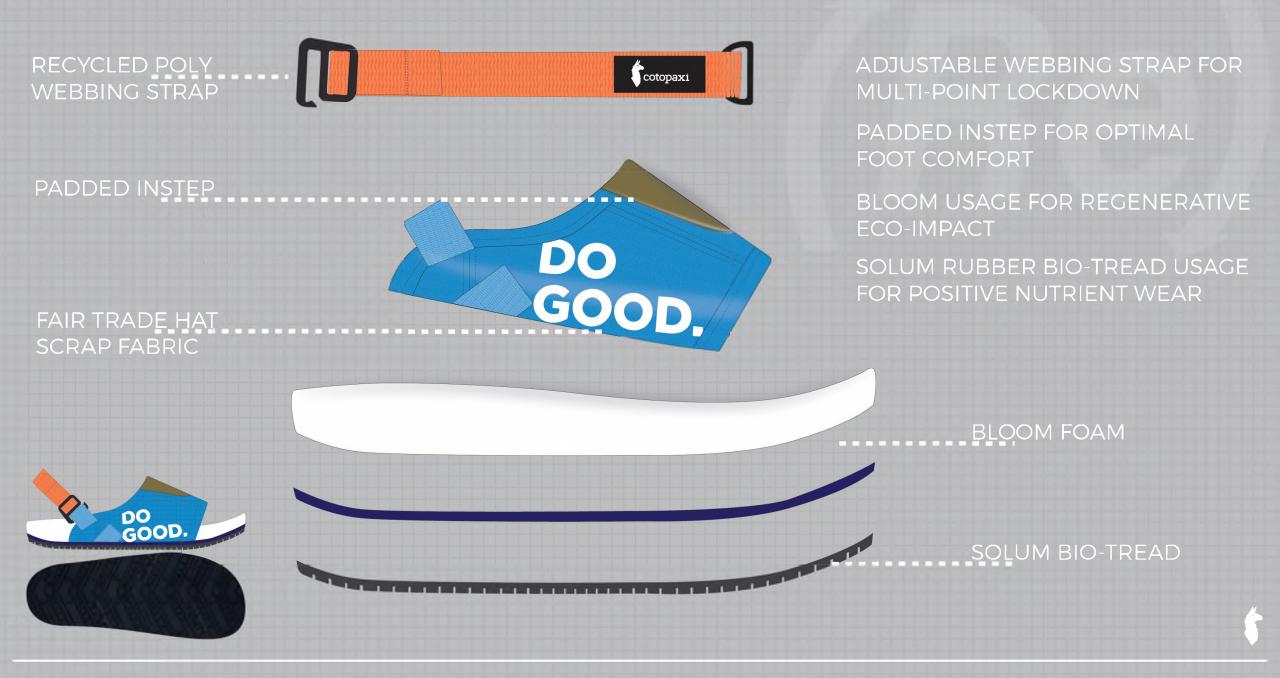




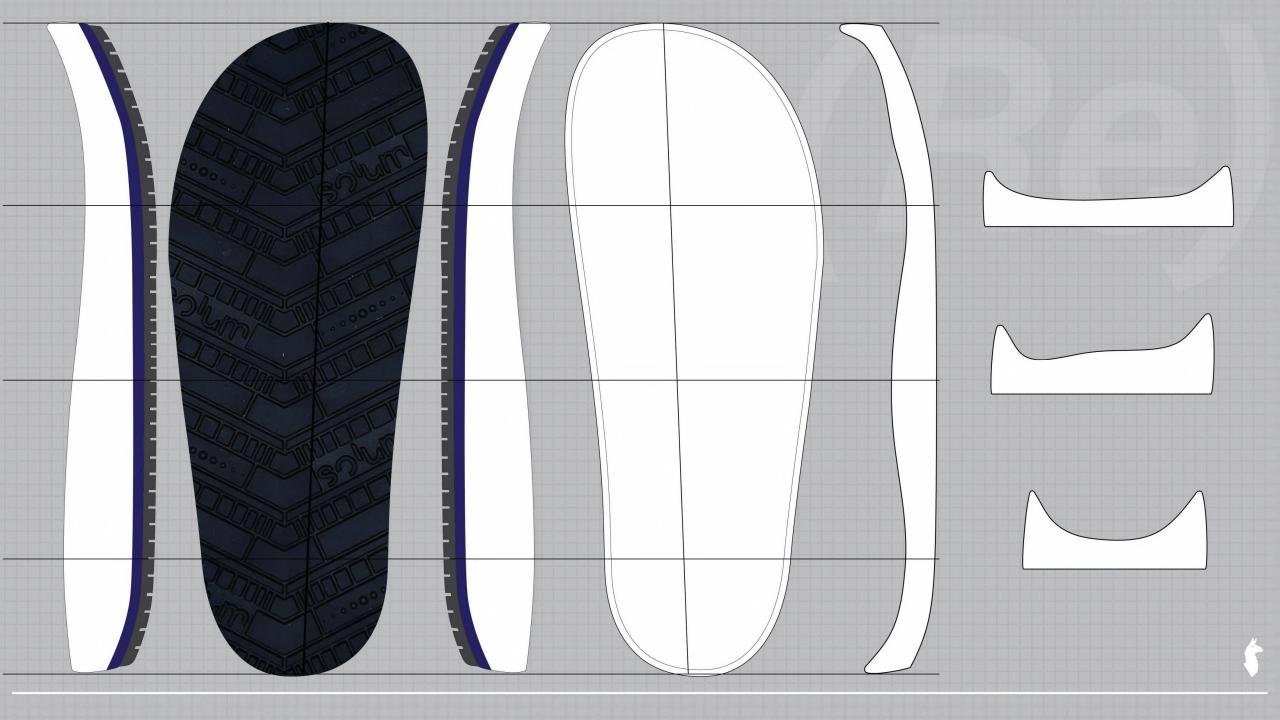
















INSTEP LOCKDOWN





BREATHABLE ALLOWANCE





















ADJUSTABILITY

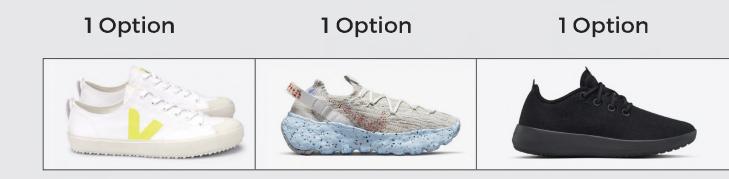
How many different ways can the shoes be stylized?

How many different use cases would the customer use the shoe?





Testing the number of wear options for fit and scenario compared to the single lace option of benchmark shoes







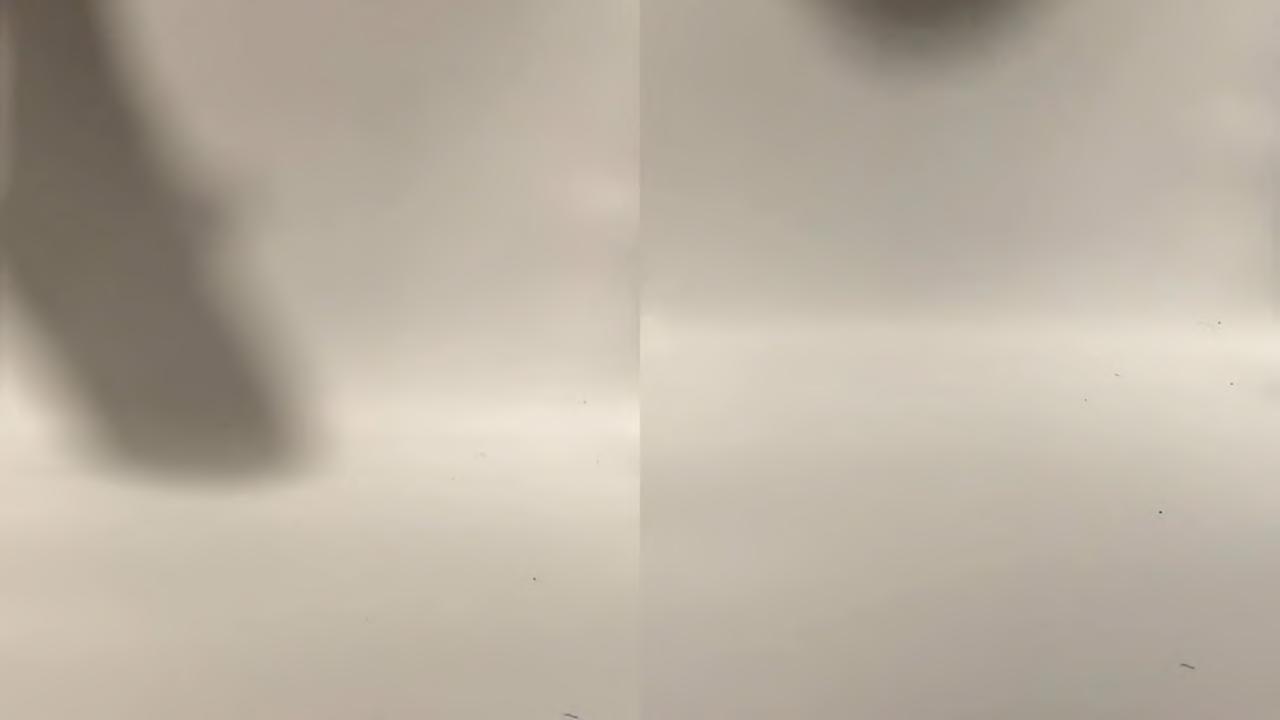


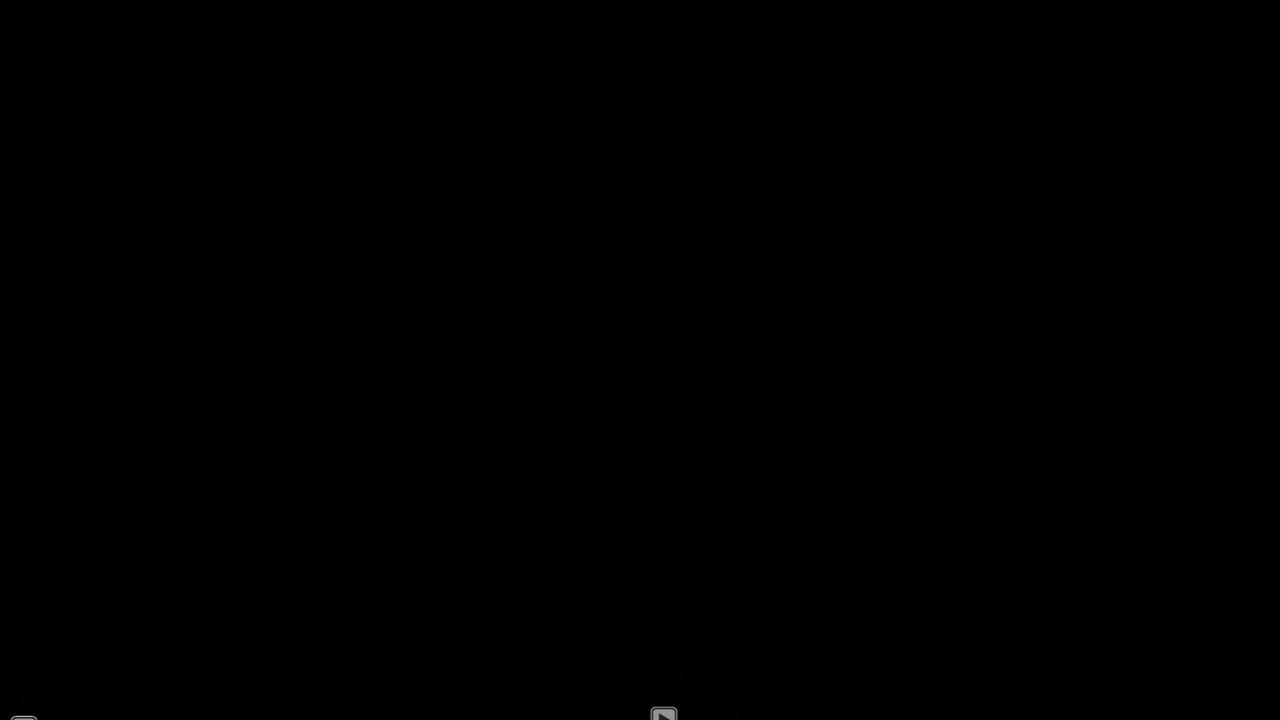


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WATER RESISTANCE

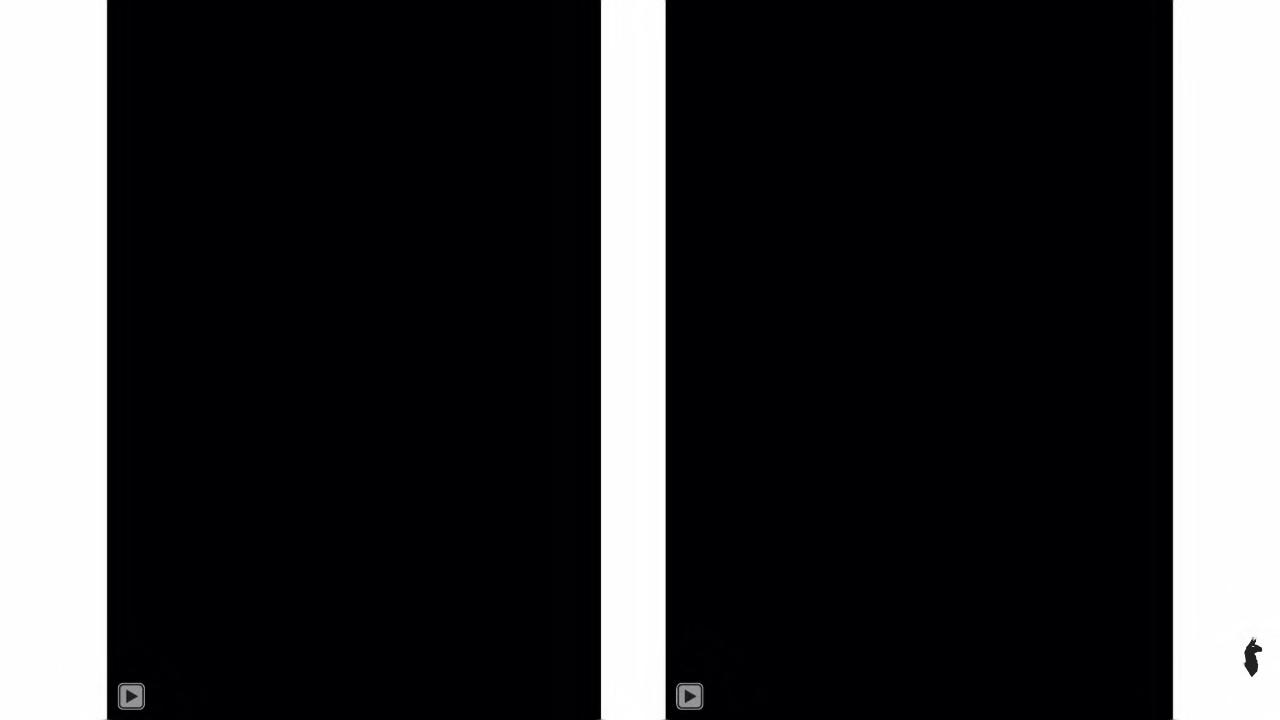
City Puddles

Moab Stream

Do their feet get wet?

- -Walk through wet terrain 5 times for consistency
- -Test a fresh pair of socks







WATER RESISTANCE

Using a controlled pool of water, shoes are tested for their ability to keep the foot dry in targeted areas. The trainer being tested in the toe/forefoot area and the boot being fully submerged for 10 seconds. Each sock is the checked for moisture

DRY SOCK























After testing and removing socks from the shoe each foot came out dry and tested positively







KETERNZ W M







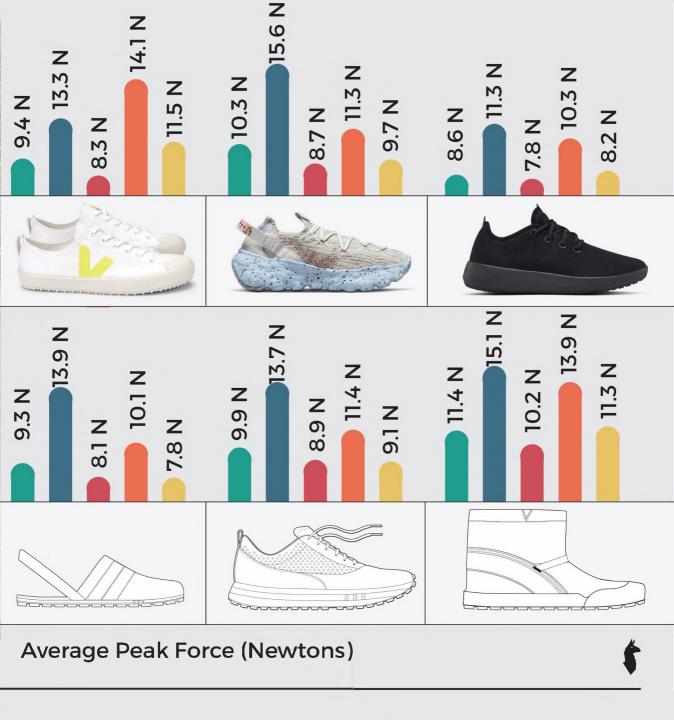


TRACTION

Using a fixed pully system and force gauge to measure the required Newtons, pull shoes across different set terrain ecosystems to evaluate traction and outsole performance.

Cotopaxi Footwear



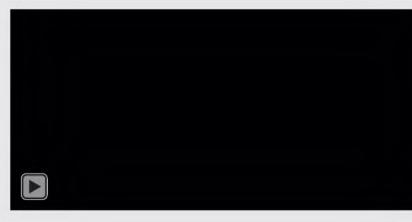


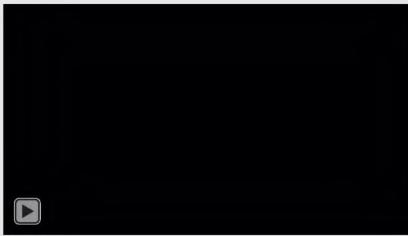


Using fog machine to run vapor through shoe upper and watch for areas where vapor comes out of shoe. How long does it take? How much vapor is there?

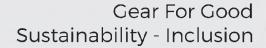
0:13 (Min : Sec) Vapor Level: HIGH

1:17 (Min : Sec) Vapor Level: MEDIUM













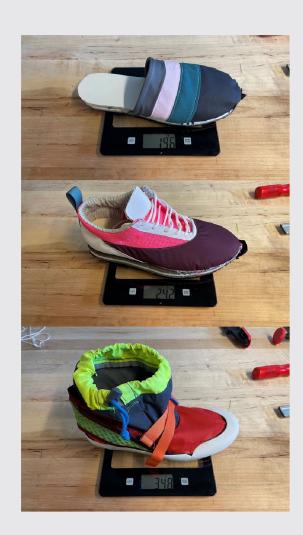
Using a scale set to Grams measure the entire weight of shoe and tooling. Shoes dry with unaltered appearance.

Cotopaxi Footwear

196 Grams

242 Grams

348 Grams







COMFORT

Subjective comfort scale

How good does your foot feel?

Is this a shoe you would use in questival type atmosphere?





WEAR TEST





WEAR TEST





WEAR TEST





SWELLING

Can we decrease swelling?

After 5 mile hike can we see a decrease in foot swelling?

Imagery every 10 minutes for an hour period





Using imagery of before and after hikes to see visual differences in swelling and redness in forefoot and top of foot-instep area





Visual Reference of feet in a relaxed state having not engaged in hiking activity and reference of socks worn in both hikes





Testing was done on the trainer and boot compared against benchmark products of the Space Hippie and Veja Nova





Using imagery of before and after hikes to see visual differences in swelling and redness in forefoot and top of foot-instep area

HIKE #1







The left foot is showing more signs of redness/swelling, as well as increased skin irritation

HIKE #2







LEFT

RIGHT

The right foot is showing more signs of redness/swelling, as well as increased skin irritation

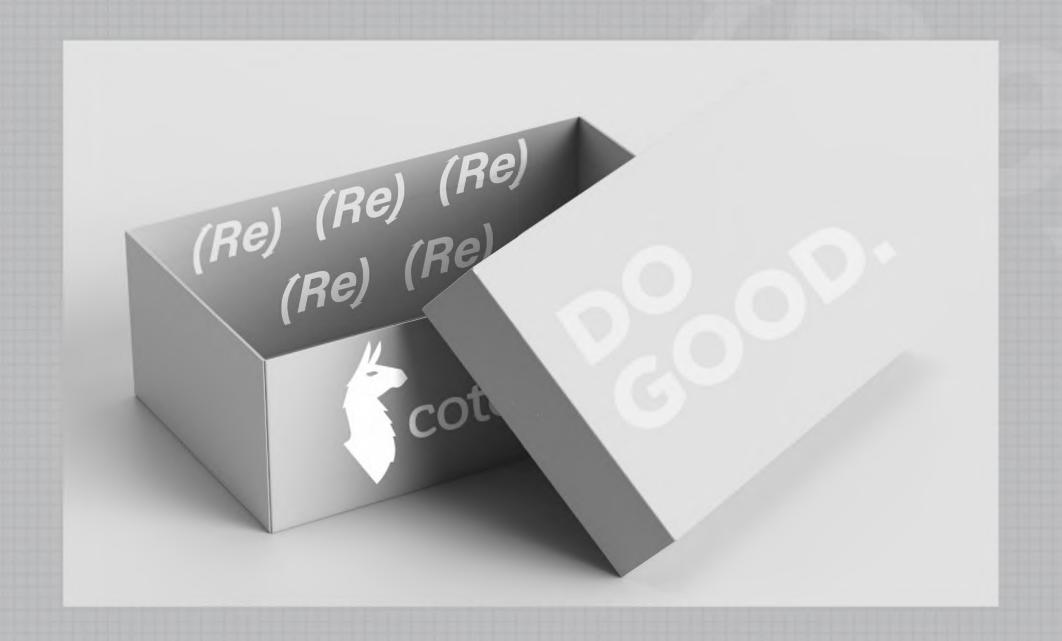






EXECUTION SUSTAINABILITY FEASIBILITY





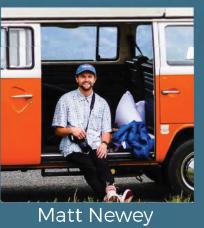


Annie Agle



Tom Kvilhaug

EXPERT





Camee Hymas

ATHLETE



Tom Berend



Jesus Alvarez

DESIGN MENTOR



Tom Berend

"THIS PRODUCT CLEARLY READS AS A COTOPAXI PRODUCT, WITH THE COLOR/MATERIAL APPLICATION IT FEELS FUN AND LIKE SOMETHING YOU WOULD SEE COTOPAXI PRODUCE..."



Tom Kvilhaug

"THIS IS AWESOME. THE COTOPAXI AESTHETIC WAS HIT RIGHT ON POINT. A LOT OF POTENTIAL HERE WITH WHAT COTOPAXI SEE'S IN THE FUTURE OF FOOTWEAR. VERY FUN."



