



Zero Carbon City International Forum

- ▶ Session 1-1
Decarbonization and Resilience

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Presentation Agenda

- ▶ Resilience
- ▶ Mitigation of Climate Change in Tsumagoi



Tsumagoi



Tsumagoi Village Gunma

Population: 8,850 (2020 Population Census)

Area: 337,58 km² (13,034 sq mi)

Elevation: Roughly 1,000m (3,280 ft)

Location: Two and a half hours drive from Tokyo

Major Industry: Agriculture (cabbage), tourism

Tsumagoi is on a plateau area surrounded by three active volcanos: Mt. Asama, Mt. Azumaya and Mt. Motoshirane. It provides us with different types of onsen, which benefits health and beauty in many ways. There are also entertainment facilities such as golf courses, ski resorts and campsites.

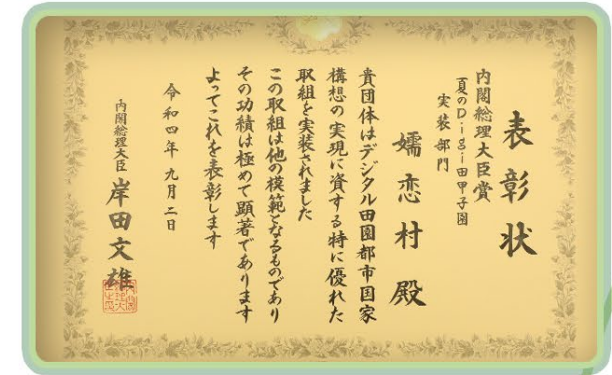




Resilience



デジタル田園都市国家構想
DIGIDEN



Category: Implementation

Town / Village

Prime Minister's Award

Tsumagoi Village

Tsumagoi Smart City for tourism and relationship population growth

Social Media

Disaster Prevention

群馬県嬭恋村 スマートシティ一般ダッシュボード
https://www.smartcity-net.com

嬭恋スマートシティ

防災・規制情報

報告区分・種別: その他・その他
住所: 群馬県吾妻郡嬭恋村大前188
報告内容: 【庁内 防災スマートシティ練習会 終了のお知らせ】
嬭恋村役場 未来創造課より (お問い合わせ先: 0279-96-1257)

日頃より、嬭恋村スマートシティをご利用いただき誠にありがとうございます。

本LINEを活用した災害時の情報共有練習会を終了致します。

ご理解・ご協力いただき誠にありがとうございました。

このあとのプッシュ通知は訓練ではございません。

以上、よろしくお願いたします。
画像: なし
報告日時: 2023/01/27 12:02

ダッシュボードへ

嬭恋村防災メニュー

Tourism

群馬県嬭恋村

会』さんの情報をお届けします。

2月のピックアップ

- ・休暇村嬭恋鹿沢
【スノーシューイベントが今年も始まります!】
- ・ログコテージふりーたいむ
【ダイユースプラン&サウナテントレンタル開始!】
- ・嬭恋村くろこ保存会
【200年近い歴史を誇る伝統食“くろこ”を食べよう!】

2月ピックアップ情報の詳細はこちらをクリック

エリアから探す AREA
テーマから探す THEME
地図から探す MAP

受信情報を選ぶ 質問する Q&A 防災メニューに行く

嬭恋村観光メニュー



Issue: Disaster Prevention



Typhoon No.19 (a.k.a Typhoon Habigis) in 2019



96-0121



Typhoon No.19 hit in 2019

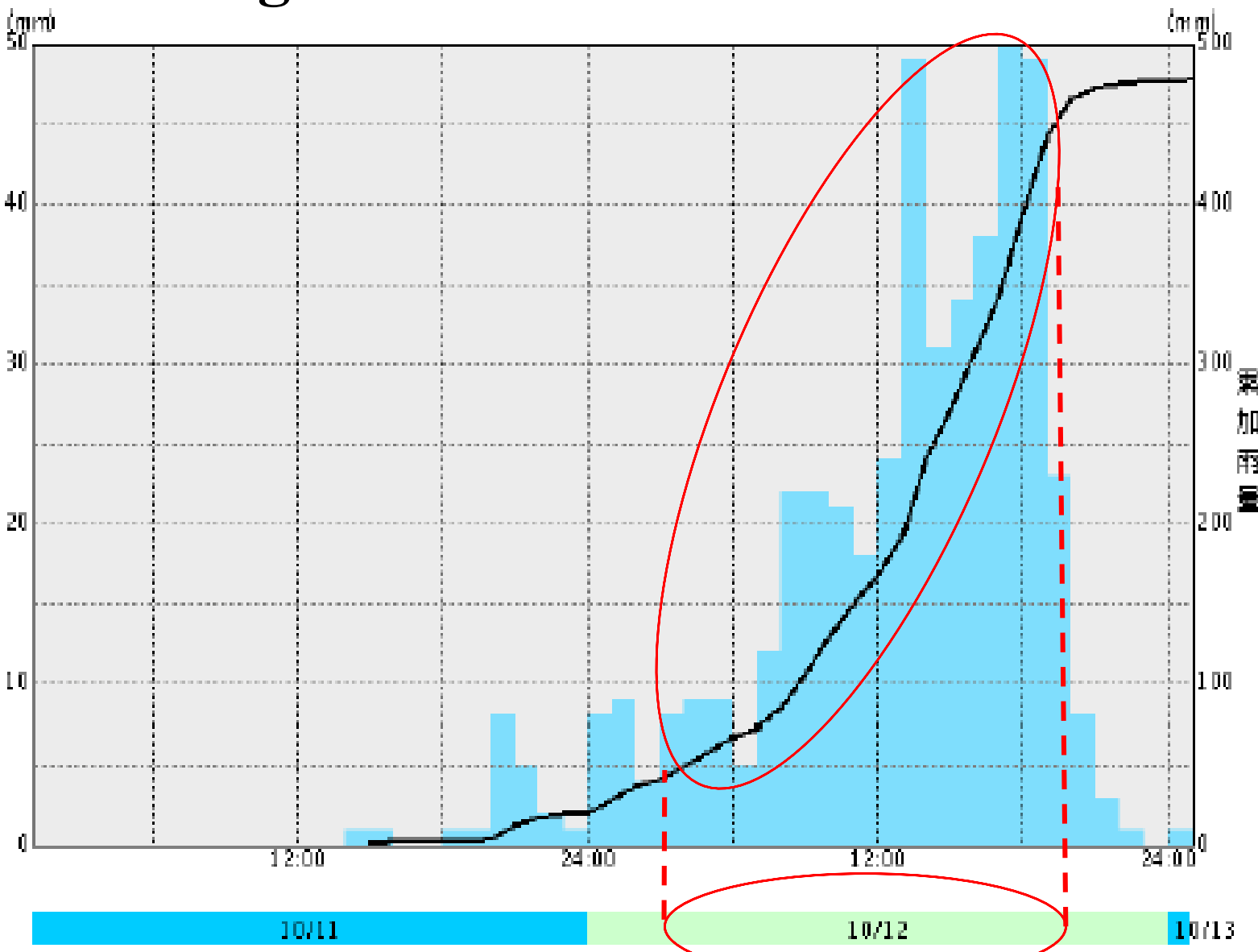
-Unprecedented disaster in Tsumagoi

Agricultural damage: 650 million JPY
⇒ Agricultural land: 50 spots
Agricultural facility: 67 spots

Cumulative precipitation: 485mm
(19.094 inches)

Housing
- Completely destroyed: 5 cases
- Partially destroyed: 5 cases

Flood
- Above floor level : 3 cases
- Below floor level : 9 cases

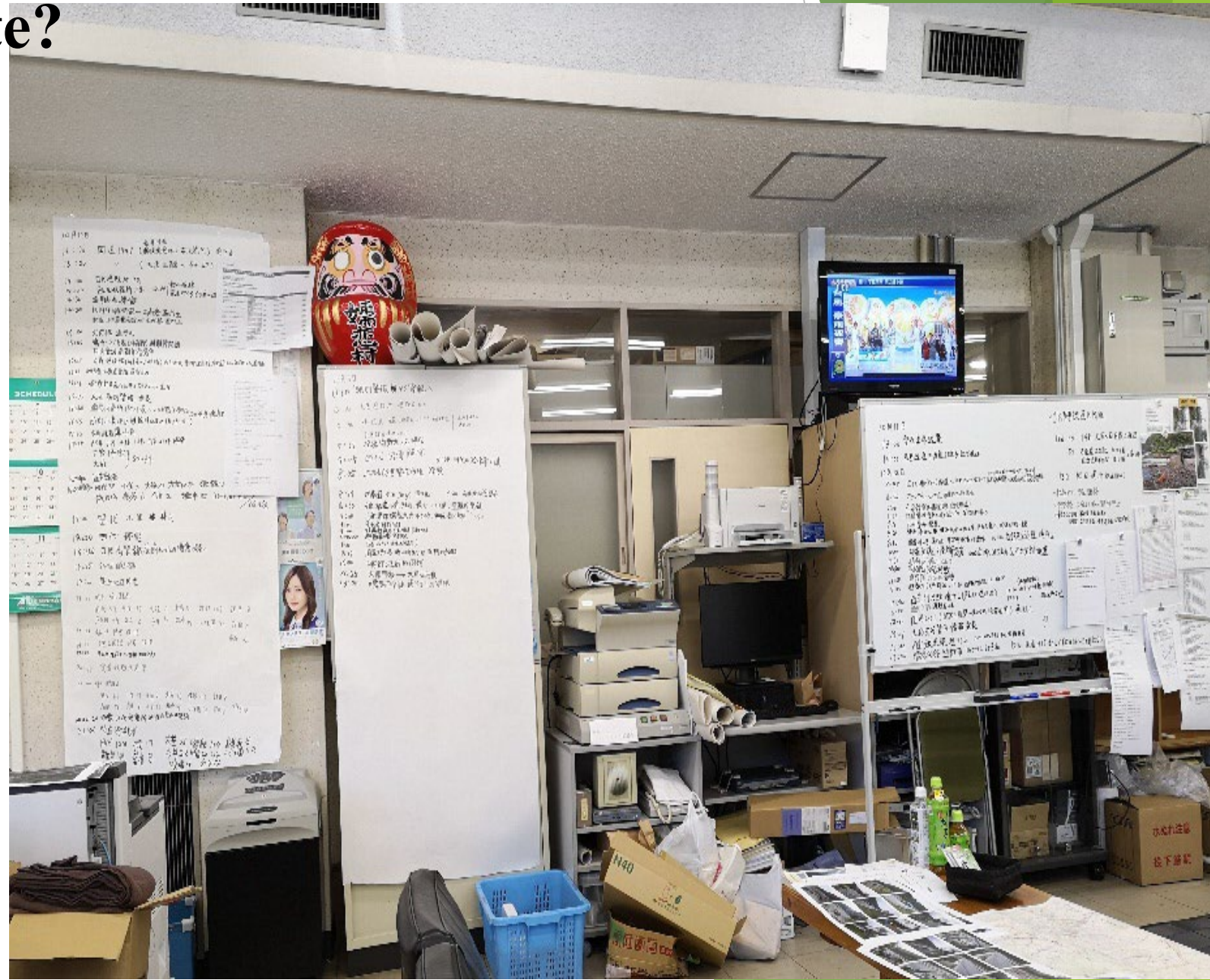


How did information sharing look like?

How did we communicate?

Reality

- Method mostly used: Telephone
→ Unable to grasp the situation as headquarters
- Evacuation shelter was completely isolated
→ Unable to figure out the latest move of headquarters
- Location of staff
→ Unable to figure out where they provide support
- Information sharing within the village
→ Unable to answer questions
→ Sharing of important information





Issue: Tourism

Impact of COVID-19

● Restrictions on holding events

- The number of tourists in Tsumagoi has dropped from two million to eight hundred thousand per year.
- The amount of opportunities to learn about Tsumagoi decreased.
- What should we prepare looking ahead to “living with COVID-19” and “post-COVID-19”?

However, we have time to “think”.

Information on tourist and relationship population is not compiled systematically

A large amount of tourism information is scattered on paper and the Internet

Scattered tourist spots get tourists confused

What do you think if you were told something like this at your travel destination?

- **Here’s a tourism app.**
- **And here’s a disaster prevention app.**
- **Please download them if you would like.**



Challenges to Decarbonization

Mitigation of Climate Change



Participation into a startup support program for zero carbon city

○ About the program

Gunma Prefecture provides municipality, which commits to working on decarbonization, with support for its ideal future, cooperating with Kanto Regional Environment Office as well as Kanto Bureau of Economy, Trade and Industry. The support may include determining the direction of initiatives and establishing implementation system for decarbonization.

Mitigation

- **What can Tsumagoi Village do?**
- **What should Tsumagoi Village do?**
- **What should we show to the locals?**

Adaptation

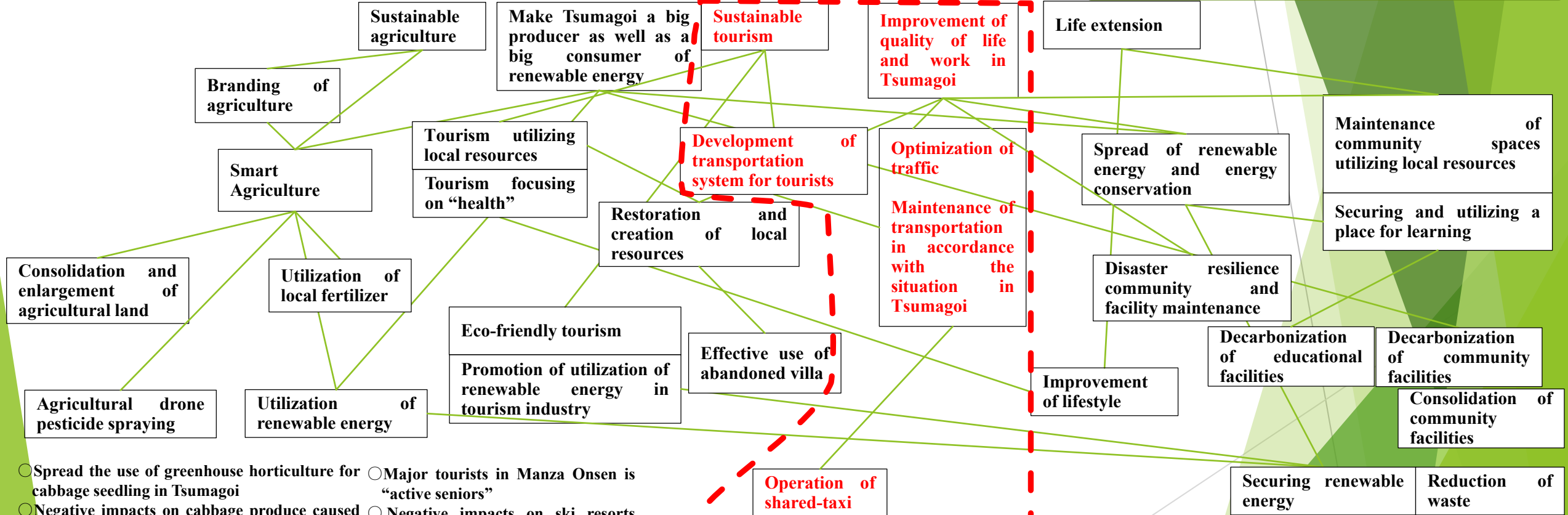
Implementation of resilience against disaster prevention/ tourism and other external factors



Tsumagoi – a village where life in zero carbon city is possible

<3 keys to Decarbonization in Tsumagoi>

- ① Agriculture: Eating local agricultural products
- ② Everyday life: Living in Tsumagoi
- ③ Tourism: Traveling to Tsumagoi



- Spread the use of greenhouse horticulture for cabbage seedling in Tsumagoi
- Negative impacts on cabbage produce caused by climate change
- Farmland area each farmer owns tends to be small. The number of tractor owned increases.
- A lack of successors/decrease of cabbage farmer
- Transport of cabbage
- Major tourists in Manza Onsen is “active seniors”
- Negative impacts on ski resorts caused by climate change
- Burden of the Manza Highway managed by a private enterprise
- A lack of successors in tourism industry
- Inbound
- Abolition of public transportation system
- Decrease in the number of trains (the Agatsuma line)
- High usage rate of vehicles by tourists
- Deterioration of scenery in villa area
- Increase in the number of migrants
- Aging society
- Unhealthy lifestyle during agricultural off season
- Safety confirmation of single elderly people
- Flood damage of Agatsuma river
- Eruption of Mt. Asama and Mt. Motoshirane
- Power generation of renewable energy that exceeds power consumption of the area
- Onsen resort/geothermal energy
- Decrease in precipitation

Decarbonization

**Community
Development**

**Digital
Transformation**



Thank you for listening.