ISSN: P-2455-0515
E- 2394-8450

Educreator Research Journal

A Peer Reviewed Referred Journal

OPEN ACCESS

Volume–IX, Special Issues–I
March – April 2022

Original Research Article

# TEMPORAL CHANGE IN AREA UNDER FOOD CROPS IN HIMACHAL PRADESH

*Mrs. Yashu Sharma

*Ph D. Scholar, Department of Geography, Panjab University, Chandigarh.

**Abstract:**

*Himachal Pradesh is primarily an agricultural state, with agriculture employing 71% of the population and cash crops accounting for the majority of the state's earnings. Wheat, maize, rice, barley, seed-potatoes, ginger, vegetables, vegetable seeds, mushrooms, chicory seeds, hops, and olives are among the most important food crops cultivated in Himachal Pradesh agriculture. Because of its large-scale fruit production, Himachal Pradesh is also known as the "Apple State of India." Farmers' principal priority is how to make the best use of limited land. The current research seeks to examine the change in area under different food crops in Himachal Pradesh from 1990-91 to 2015-16. According to the findings, the state's typical cropping pattern is altering. From 1990-91 to 2015-16, the area under cereals and pulses in Himachal Pradesh declined by 5.1 percent and 1.5 percent, respectively, while the area under fruits and vegetables grew. The state is moving away from cultivating cereals and pulses and toward growing fruits and vegetables. During the given time, the biggest negative change in the area of cereals was discovered in Shimla, while the highest positive change in the area of cereals was found in Solan. Shimla district has the largest positive change in fruits, whereas Una district has the highest negative change in the given time. The most practical method for utilising these restricted resources is to adjust the cropping style.*



## Introduction:

Himachal Pradesh is a state in northern India, located between 30°22′N and 33°12′N latitude, and 75°47′E and 79°04′E longitude, in the Western Himalayas. It is a hilly state with a total area of 55,673 square kilometres. Himachal Pradesh is divided into twelve districts, each of which is divided into three divisions: Shimla, Kangra, and Mandi. There are 73 subdivisions, 78 blocks, and 172 Tehsils that make up the districts. Agriculture is the most common occupation in Himachal Pradesh. Agriculture contributes for 9.4% of the gross domestic product (GDP). Agriculture directly employs 71 percent of the population in the state. Despite this, agriculture continues to be plagued by issues such as tiny and marginal land holdings. According to estimates from Himachal Pradesh's Economics and Statistics Department, just 65 percent of the reported area is suitable for cultivation. Only 21% of the available land is utilised for net planted area and existing fallow land. Wheat, maize, rice, and barley are the principal grains farmed, with maize-wheat, rice-wheat, and maize-potato-wheat being the most common cropping systems. Other crops farmed in the state include pulses, fruits, vegetables, and oilseed.

Because of its large-scale fruit production, Himachal Pradesh is sometimes known as the "Apple State of India." Fruit production has been a major source of income for farmers, and it has been a boon to the state's economy. An excellent irrigation system, access to low-cost cargo, and well-structured marketing facilities are only a few of the key factors that have contributed to Himachal Pradesh's outstanding agricultural success.

**Objective of the Study:**

1. The research paper aims to discuss the following objective:
2. To analyse the temporal change in the area under food crops in Himachal Pradesh.

**Methodology:**

The data used in this paper is entirely secondary. The information was gathered from publicly available data from Shimla's Directorate of Land Records, Directorate of Economics and Statistics. The information was tabulated and analysed. The percentage share of each crop in the total cropped area in each district has been computed. A percent share has been calculated to represent the change in area under food crops in Himachal Pradesh. A bar chart has been created.

**Table: 1.Temporal Change in area under Food Crops (percentage)**

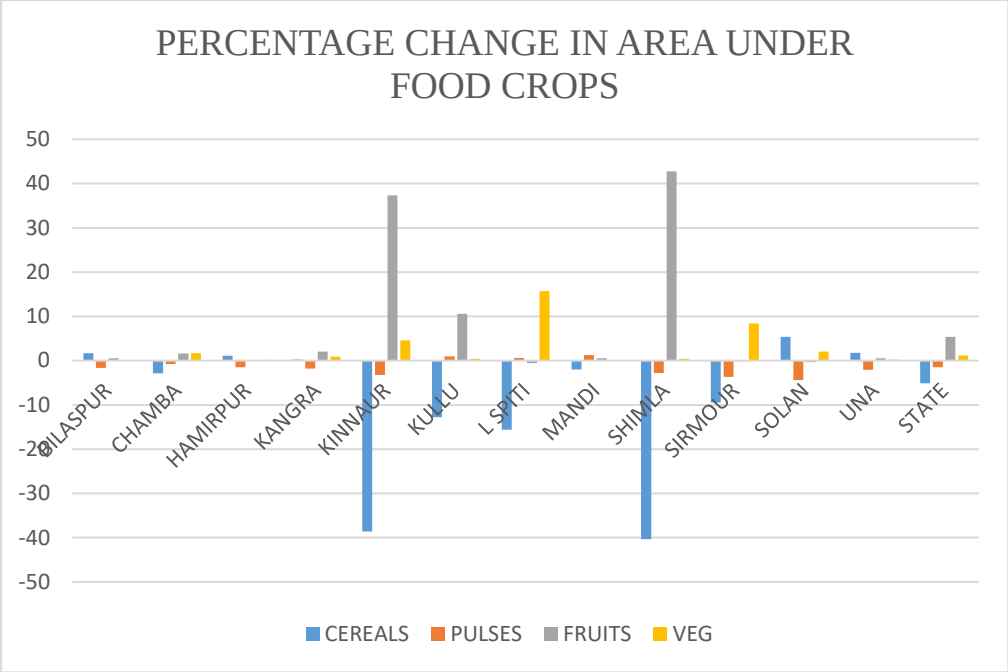
| District | Cereals | | | Pulses | | |
|---|---|---|---|---|---|---|
| Year | 1990-91 | 2015-16 | Change | 1990-91 | 2015-16 | Change |
| Bilaspur | 94.31 | 96.2 | 1.71 | 2 | 0.35 | -1.65 |
| Chamba | 86.99 | 84.12 | -2.87 | 5.72 | 4.95 | -0.77 |
| Hamirpur | 97.61 | 98.69 | 1.08 | 1.49 | 0.01 | -1.48 |
| Kangra | 87.57 | 87.8 | 0.23 | 2.78 | 1.03 | -1.75 |
| Kinnaur | 64.04 | 25.41 | -38.63 | 11.91 | 8.7 | -3.21 |
| Kullu | 74.02 | 61.26 | -12.76 | 5.85 | 6.79 | 0.94 |
| L-Spiti | 37.7 | 22.1 | -15.6 | 0.64 | 1.22 | 0.58 |
| Mandi | 89.3 | 87.3 | -2 | 2.84 | 4.09 | 1.25 |
| Shimla | 64.07 | 23.75 | -40.32 | 5.83 | 3 | -2.83 |
| Sirmour | 81.58 | 72.13 | -9.45 | 6.04 | 2.35 | -3.69 |
| Solan | 82.28 | 87.69 | 5.41 | 7.33 | 2.93 | -4.4 |
| Una | 88.68 | 90.46 | 1.78 | 2.27 | 0.19 | -2.08 |
| State | 84.34 | 79.24 | -5.1 | 4 | 2.5 | -1.5 |

Source: Directorate Land Records, Shimla.

**Table: 2 Temporal Change in area under Food Crops (percentage)**

| | | | | | | |
|---|---|---|---|---|---|---|
| Year | 1990-91 | 2015-16 | Change | 1990-91 | 2015-16 | Change |
| Bilaspur | 0.65 | 1.21 | 0.56 | 0.72 | 0.64 | -0.08 |
| Chamba | 2.02 | 3.61 | 1.59 | 1.14 | 2.81 | 1.67 |
| Hamirpur | 0.03 | 0.12 | 0.09 | 0.2 | 0.36 | 0.16 |
| Kangra | 1.75 | 3.77 | 2.02 | 1 | 1.86 | 0.86 |
| Kinnaur | 19.62 | 56.99 | 37.37 | 3.67 | 8.22 | 4.55 |
| Kullu | 12.34 | 22.92 | 10.58 | 6.15 | 6.52 | 0.37 |
| L-Spiti | 0.52 | 0 | -0.52 | 57.48 | 73.82 | 15.72 |
| Mandi | 3.46 | 4.02 | 0.56 | 2.75 | 2.83 | 0.08 |
| Shimla | 18.52 | 61.3 | 42.78 | 10.56 | 10.95 | 0.39 |
| Sirmour | 2.17 | 2.04 | -0.13 | 2.87 | 11.28 | 8.41 |
| Solan | 1.08 | 0.73 | -0.35 | 2.95 | 5 | 2.05 |
| Una | 0.37 | 0.9 | 0.53 | 2.22 | 2.45 | 0.23 |
| State | 4.49 | 9.86 | 5.37 | 3.21 | 4.37 | 1.16 |

Source: Directorate Land Records, Shimla.




Tables 1 and 2 show that in Bilaspur district, the percentage area under cereals increased by 1.71 percent, while the percentage area under pulses decreased by 1.65 percent, the percentage area under fruits increased by 0.56 percent, and the percentage area under vegetables decreased by 0.08 percent. The percentage change in cereals and pulses in Chamba district was decreased by 2.87 and 0.72 percent, respectively. Although a gain of 1.59 percent and 1.67 percent in the area under fruits and vegetables, respectively. The percentage area under cereals, fruits, and vegetables has increased in Hamirpur district, whereas the area under pulses has decreased. The percentage area under cereals, fruits, and vegetables has increased in Kangra district, whereas the area under pulses has decreased. The percentage share of cereals in Kinnaur district has declined by 38.63 percent. The percentage of pulses in the diet was also dropped by 3.21 percent. Fruit and vegetable production grew by 37.37 percent and 4.55 percent, respectively. The area under cereals in Kullu district has reduced by 12.76 percent. The area under pulses, fruits, and vegetables, on the other hand, grew by 0.94 percent, 10.58 percent, and 0.37 percent, respectively. The area under cereals and fruits in Lauhal-Spiti has decreased by 15.6 percent and 0.52 percent, respectively. However, the area under pulses and vegetables has increased by 0.58 percent and 15.72 percent, respectively. The area under grains has decreased by 2% in Mandi district, whereas pulses, fruits, and vegetables have increased by 1.25 percent, 0.56 percent, and 0.08 percent, respectively. The percentage of area under grains has declined substantially by 40.32 percent in Shimla district, and pulses have also decreased by 2.83 percent. Fruit and vegetable growing areas have expanded by 42.78 percent and 0.39 percent, respectively. The area planted in cereals, pulses, and fruits declined by 9.45 percent, 3.69 percent, and 0.13 percent, respectively, in Sirmour district, whereas the area planted in vegetables climbed by 8.41 percent. The percentage proportion of land under cereals and vegetables has increased by 5.41 and 2.05 percent in Solan district, respectively, whereas the percentage share of area under pulses and fruits has fallen by 4.41 and 0.35 percent. The area planted in grains, fruits, and vegetables increased by 1.78 percent, 0.53 percent, and 0.23 percent in Una district, respectively, while the percentage share of area planted in pulses declined by 2.08 percent. Between 1990-91 and 2015-16, the area under grains and pulses in Himachal Pradesh declined by 5.1 percent and 1.5 percent, respectively. Fruits and vegetables, on the other hand, have increased by 5.37 percent and 1.16 percent, respectively. Shimla had the biggest negative change in grains in Himachal Pradesh from 1990-91 to 2015-16, followed by Kinnaur. And Solan has seen the most favourable shift. The biggest negative change in pulses was observed in Solan,

whereas the highest positive change was recorded in Kullu district, which is not significant. Shimla district has the most positive change in percentage share of land under fruits, whereas Una district has the highest negative change. From 1990-91 to 2015-16, the area under vegetables in Lauhal-Spiti has seen the most positive change, whereas the negative change in Bilaspur district has been minor.

**Findings/ Results:**

As can be seen, there is a shift in Himachal Pradesh from grains and pulses to fruits and vegetables, or, to put it another way, cereals to cash crops. The percentage share of area for grains has increased in Bilaspur, Hamirpur, Kangra, Solan, and Una. The percentage share of area in Chamba, Kinnaur, Kullu, Lauhal-Spiti, Mandi, Shimla, and Sirmour districts has decreased. With the exception of Kullu, Lauhal-Spiti, and Mandi, all districts have seen a decrease in the area under pulses. However, the percentage change in these districts has not been as significant. In the case of fruits, the majority of districts have seen a positive change, including Bilaspur, Chamba, Hamirpur, Kangra, Kullu, Shimla, and Una, while others have had a negative change of less than 1%. Except for Bilaspur, where there has been a minor shift, the area under vegetables has increased in all districts. The needs of society, particularly their dietary choices, have shifted as a result of changing lifestyles, and as a result, farmers' cropping patterns have shifted as well. In order to fulfil the changing expectations of society, the state of Himachal Pradesh has followed the same path. Cereals and pulses have gone down in price. This indicates that the area under these crops has dropped over time, but fruits and vegetables have showed a positive shift, indicating that the area under these crops has increased over time. In Himachal Pradesh, agricultural diversification toward fruit and vegetable crops began in the late 1960s and continued throughout the 1970s and 1980s, particularly in some sections of the districts of Shimla, Kullu, Solan, and Lahaul-Spiti. Crop diversification gained traction in the 1990s and has since expanded to many additional regions in the low and mid hill zones. Crop diversification has had a significant impact on the quality of life of cultivating households, the vast majority of which operate on less than one hectare of land. This impact can be seen at the macro level in a number of socio-economic metrics and poverty levels that compare favourably to both mountainous and other developed states. Crop diversification toward high-value crops is also economically beneficial and reduces stress on natural resource bases, according to micro-level experiences (Chand, 1996; Sharma, 1996 and 2005; Sharma and Chauhan, 2008).

**Conclusion:**

Based on the foregoing, it may be concluded that the state is rapidly modifying its customary cropping pattern. The state is moving away from cultivating cereals and pulses and toward growing fruits and vegetables. Because of the increasing horticultural sector, which includes fruit and vegetables, the agricultural sector has been able to function quite well. The growing share of gross cultivated area under fruit and vegetable crops in the state demonstrates the continued process of crop diversification in the state. This is reflected in the increased contribution of these crops to the gross value of agricultural output. This transition is caused by changes in people's eating choices on the one hand, and money on the other. The most essential component facilitating this transformation is the climate. Apart from the environment, the state and federal governments are also playing a key role in modifying farmers' cropping styles by providing infrastructure amenities such as roads and markets, as well as improving R&D networks by building numerous research institutes around the state. Farmers, on the other hand, continue to face issues such as tree ageing, climate change, and a lack of information. To address these issues, the government must provide assistance to farmers in order for them to cope with shifting cropping patterns.

**References:**

Firdaus, G. (2016). Changing cropping pattern around the urban centre: analysing the role of consumption pattern of the people, Journal of Agricultural Research and Development, Vol. 6(3), 056- 064.

Gogoi, M. (2016). Cropping pattern in Sivasagar district, Assam, India: a case study, International Journal of

Innovative Research and Development. Vol. 5(10). Pp. 278- 286.

Kaur, N. (2002). Spatial diffusion of orchards in Himachal Pradesh, (Published Doctoral Thesis), Panjab University, Chandigarh, India.

Kaur, D. (1986). Change in agricultural land use in the Bist Doab: 1951- 80- A Spatial Analysis, (Published Doctoral Thesis), Panjab University, Chandigarh, India.

Kumar, V. (2016). Land Use and Cropping Pattern in Jaisalmer District, International Journal of Science, Engineering and Technology Research, Vol 5(4), 1080-1083.

Kumar, S. and D. Prashar (2012). An analysis on changing trends of foodgrains in Himachal Pradesh, International Journal of Pharmacy and Life Sciences, Vol. 3(6). 1739- 1741.

Misra, S.K. and V.K. Puri (2011). Indian economy- its development and experience, Himalaya Publishing House Pvt. Ltd.

Ningaraju and A.S. Das (2017). Cropping pattern and crop ranking of Mysore District, International Journal of Research- Granthaalayah, Vol. 5 (4), 334- 338.

Sangral, C (2015). Changes in cropping pattern and crop diversification in Jammu and Kashmir. In: IOSR Journal of Humanities and Social Sciences, Vol. 20, Issue 4, Ver II, 07- 09.

10. Shilpa (2018) Changing Cropping Pattern in Himachal Pradesh. In: VOL-3, ISSUE-7, and October- 2018.

Tripathy, P.K. and K. Sarap (1994). Development profile of Orissa agriculture. In: Compressive History and Culture of Orissa, Vol 11 (Part 2), Ed; P.K. Mishra. Kaveri Books, New Delhi, 969- 77

***Cite This Article:***

***Mrs. Yashu Sharma,** (2022). **Temporal Change in Area under Food Crops in Himachal Pradesh**, Educreator Research Journal IX (Special Issues - I), March –April, 163-167.*