A MODEL FARM POSSIBLE WEST OF THE CASCADES.

By REV. G. H. ATKINSON.

CONDITIONS.

Our soil and climate assure success The writer has seen thirty-five harvests of cereals, vegetables and fruits in western Oregon. No failure has occurred due to soil or climate, but some local failures have resulted from want of care and proper cultivation.. Some years of great abundance, have been followed by less abundant harvests. Some fields have been ploughed and sown and reaped over thirty years and have not been manured at all, or left fallow but very few years within that period. The straw has been burned and the ashes left on the threshing ground. The ploughs have turned thin furrows. This process has exhausted a large per cent. of the rich surface soil of these old fields. But such methods reduce the value and power of land by larger and larger per cents. every year of their continuance. It is impossible to have a purse full of money, if its owner takes out money every day and puts none in. It is not possible to have good soil and good crops, if the owner gathers annual harvests therefrom and makes no return of fertilizers. The rule of solvent banks is to secure deposits in kind equal to the drafts. This rule applies to the model farm. The old farms of the Willamette valley can be restored to their virgin fertility by subsoil ploughing, by rotation and increased variety of crops and by restoring the fertilizing elements which have been extracted. Unless the owners begin this process they will find themselves the owners of lands becoming annually more and more

RESTORATION.

Let all droppings of stable and yard be sheltered, rooted over by swine for the seeds, and restored to the land. Stock pasturing and feeding enrich lands, or supply the means to do it. The Engfish turnip fields, opened to sheep in sections by movable fences both fatten them and fatten the soil for another crop also, Clover or fall wheat or turnip fields, west of the Cascade mountains, opened in like sections, with movable fences, for sheep or swine or cows or horses, will keep these lands in prime

give sure and marketable returns of various harvests for the investment. It is better to raise grasses, vegetables, fruits, grains, fowls, sheep, swine, cattle and horses and dairy products on the same farm, and have a continual income, than to raise wheat or sheep, and have only one source of revenue from the farm. The man who sells wheat or wool or butter only, and buys everything else is apt to exhaust his purse and his lands alike. Western Oregon and Washington can be the paradise for such a stock farmer. He will not raise the largest number but he will raise the best quality of plants and animals. He will make one kind secure another, and thus keep up the productiveness of every acre, the growth of every animal and the inflow of cash from every source. This has been the Scotch and English style of good tenant farming for a hundred years. In substance it must be the style of good model farming in Oregon and Washington, if it is to last a century, or even a half century longer.

Our climate west of the mountains is the analogue of that of the British Isles, and thus a sure one. It has proved to be better than that of England, and as reliable as that of France.

THE NEW HILL AND MOUNTAIN LANDS,

Lane, Douglas, Yamhill, Washington and Clackamas counties in Oregon, and Clarke, Cowlitz, Lewis and Chehalis counties in Washington Territory, for example, look rough and forbidding in their hilly parts, yet their soil is deep and strong. It bears luxuriant forests. It is deep and of like quality down to the rocks, one to twenty feet below. It comes mostly from decomposed basalt, highly charged and colored with oxide sterile and unreliable, especially for all these hills. Red and white clover grow and spread and thrive wherever sown, making rich pastures for honey bees and food for stock in every clearing. The grasses on the hills live all the year. Stock should be under shelter in winter and daily fed, but animals can live in these hills all the year. Fields of grain take on the richest green and attain a height and strength of straw and length and fullness of head, which prove the great power of the land and climate.

On all the hills the choicest farms for the cereals, vegetables and fruits can be opened. Land is cheap. TransportaNo failure will attend the farmer as we may judge from the past. The hand of the diligent will make rich.

DIFFICULTIES.

The forests are dense. Trees defy the axe and hardly yield to fire. evergreens hold these mighty ranges of hills and mountains, and man's arm seems powerless. But this very tenacity of possession is a signal of permanent values. Man can make one acre bring the harvests of four or six as now cultivated. Fifty or one hundred acres under the plough are better than four times the number away from timber and springs. The various resources of these rugged lands promote varied industry, and comfort and more wealth to the owner. They are not a bar to population. They invite the immigrations. A gentleman from Dakota, who saw the abundant clover fields near Cottage Grove, and had the offer of 160 acres, 80 under fence and plough with house and barn for \$1,200, said: "If I buy this farm, one hundred neighbors from Dakota, will follow me to this region as soon as they can sell their farms. I have not seen clover grow in Dakota, I have seen no fruit like this growing there. I am pleased and satisfied."

THE HONEY BEE IN OREGON.

BY T. L. RIGGS.

From the earliest ages the honey bee has been the companion of man, and has justly received at his hands a wellmerited attention. At no period, however, in the world's history has the cultivation of the honey bee and the production of honey received such an impetus as in the present generation. By means of improved methods the capacities of the honey bee has been increased three-fold, and what was once a pursuit of pleasure has now become one of profit, giving support to thousands in our own country alone.

The inquiry then: "Is the honey bee adapted to Oregon?" is but a natural one, and the answer cannot fail to be of interest to a great number of our citizens. For want of proper tests an answer to this question in all its bearings is an impossibility. We can, however, give partial answers; first, then, we will state as a fact that the honey bee thrives as well and winters very condition for rotation of crops and will of good quality and unlimited quantity. state east of the Rocky mountains bees do not freeze to death, and unless.